

# HUMAN CHAPTER PART 1: THE YOKOHAMA DISTURBANCE

*kneel  
down  
on the  
ground!*

THE SECOND  
YEAR OF BUNKYU  
(1862,) SEPTEMBER  
14TH (AUGUST 21ST  
IN THE JAPANESE  
CALENDAR,) OUT-  
SKIRTS OF KANA-  
GAWA, NAMAMUGI  
VILLAGE



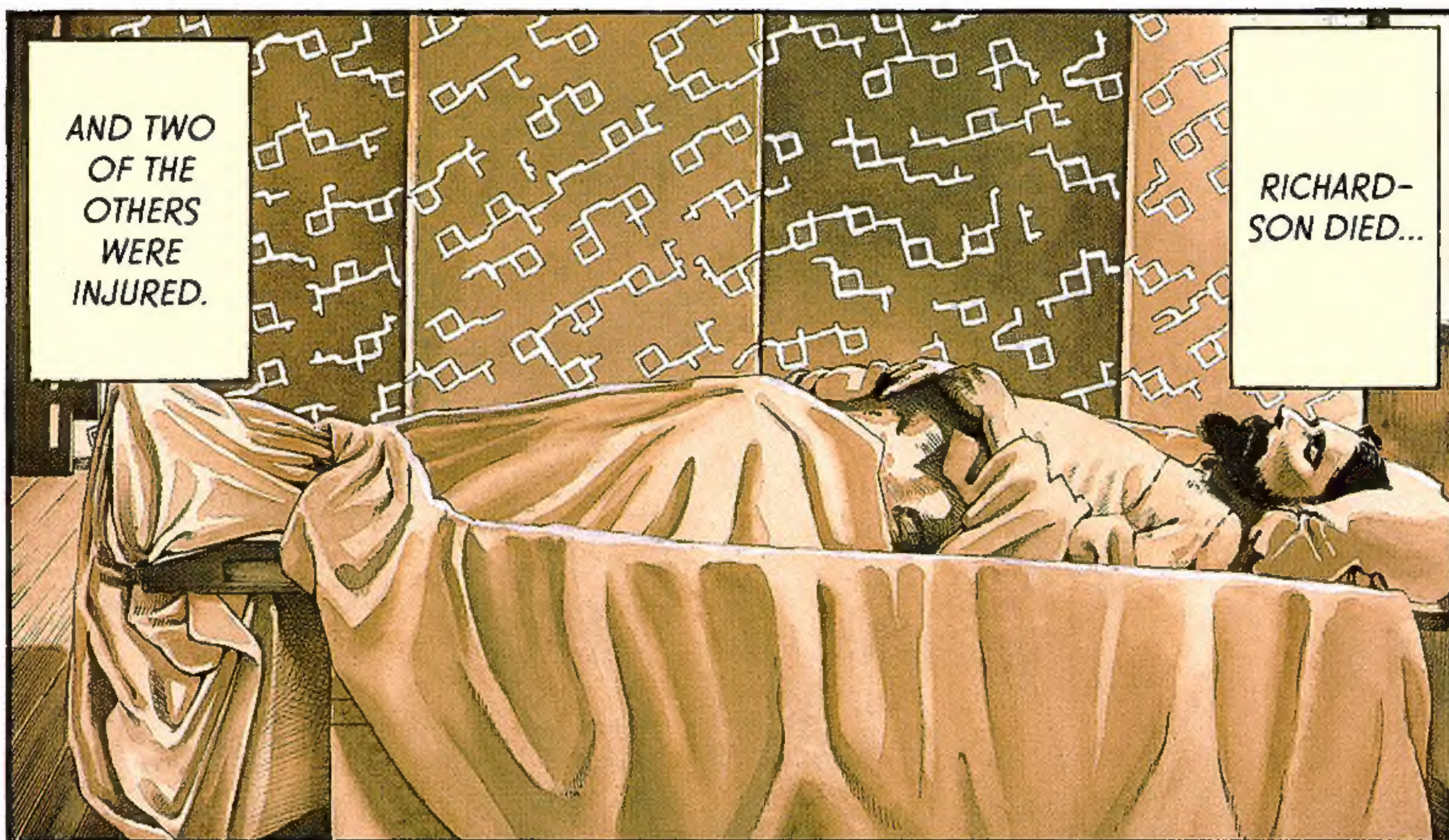
## HUMAN CHAPTER PART 1: THE YOKOHAMA DISTURBANCE



...AND WERE  
ASSAULTED  
FOR THEIR  
DISCOURTESY.

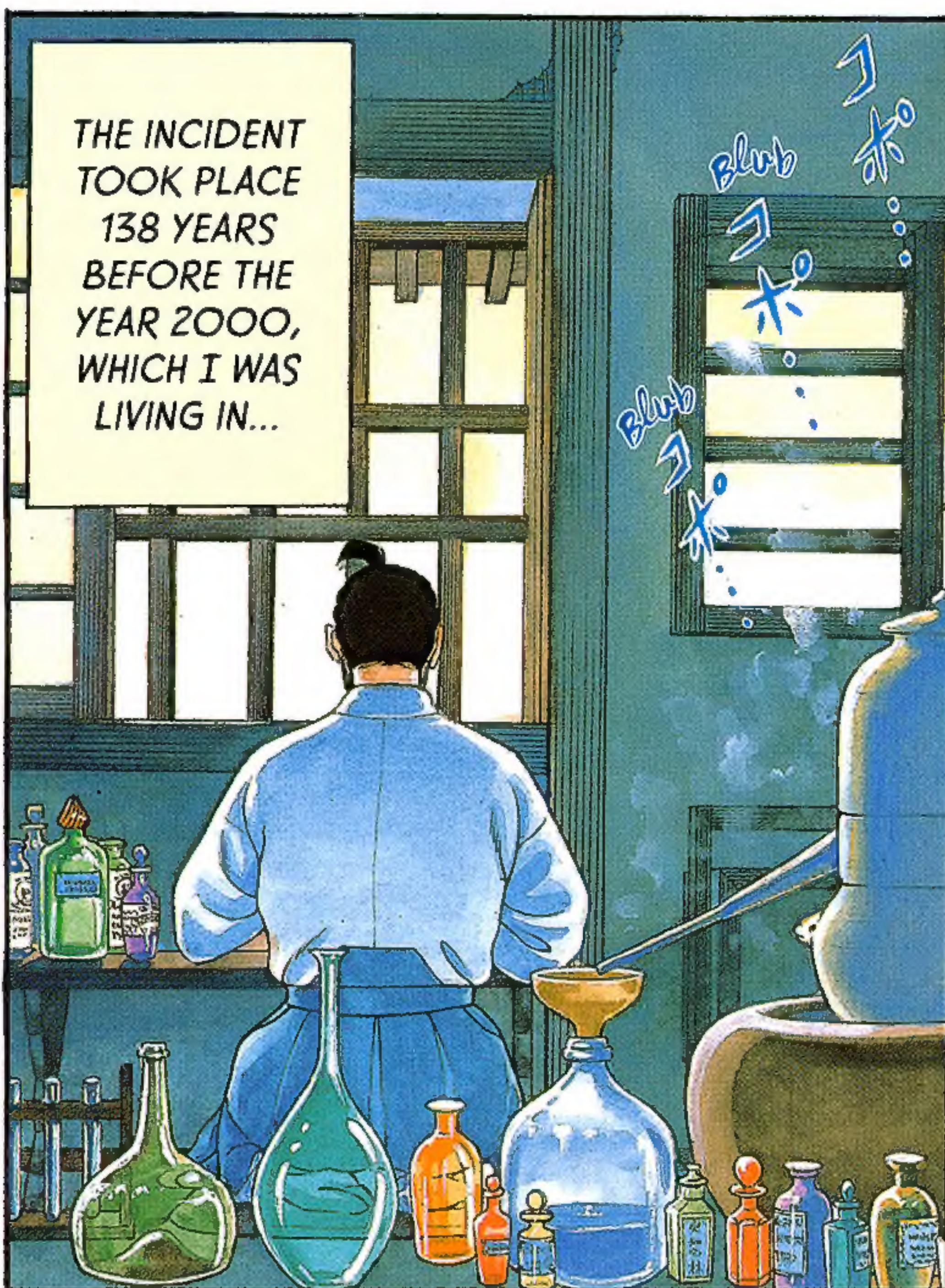
ON THIS DAY,  
FOUR FOREIGNERS,  
INCLUDING A BRITISH  
MERCHANT BY THE  
NAME OF RICHARDSON,  
WHO WERE VISITING  
FOR THE SUMMER FROM  
SHANGHAI CUT ACROSS  
THE PROCESSION OF  
THE LORD OF THE  
SATSUMA DOMAIN...





AND TWO  
OF THE  
OTHERS  
WERE  
INJURED.

RICHARD-  
SON DIED...



THE INCIDENT  
TOOK PLACE  
138 YEARS  
BEFORE THE  
YEAR 2000,  
WHICH I WAS  
LIVING IN...



IT WAS JUST  
LIKE WHAT WAS  
WRITTEN IN  
THE HISTORY  
TEXTBOOKS...

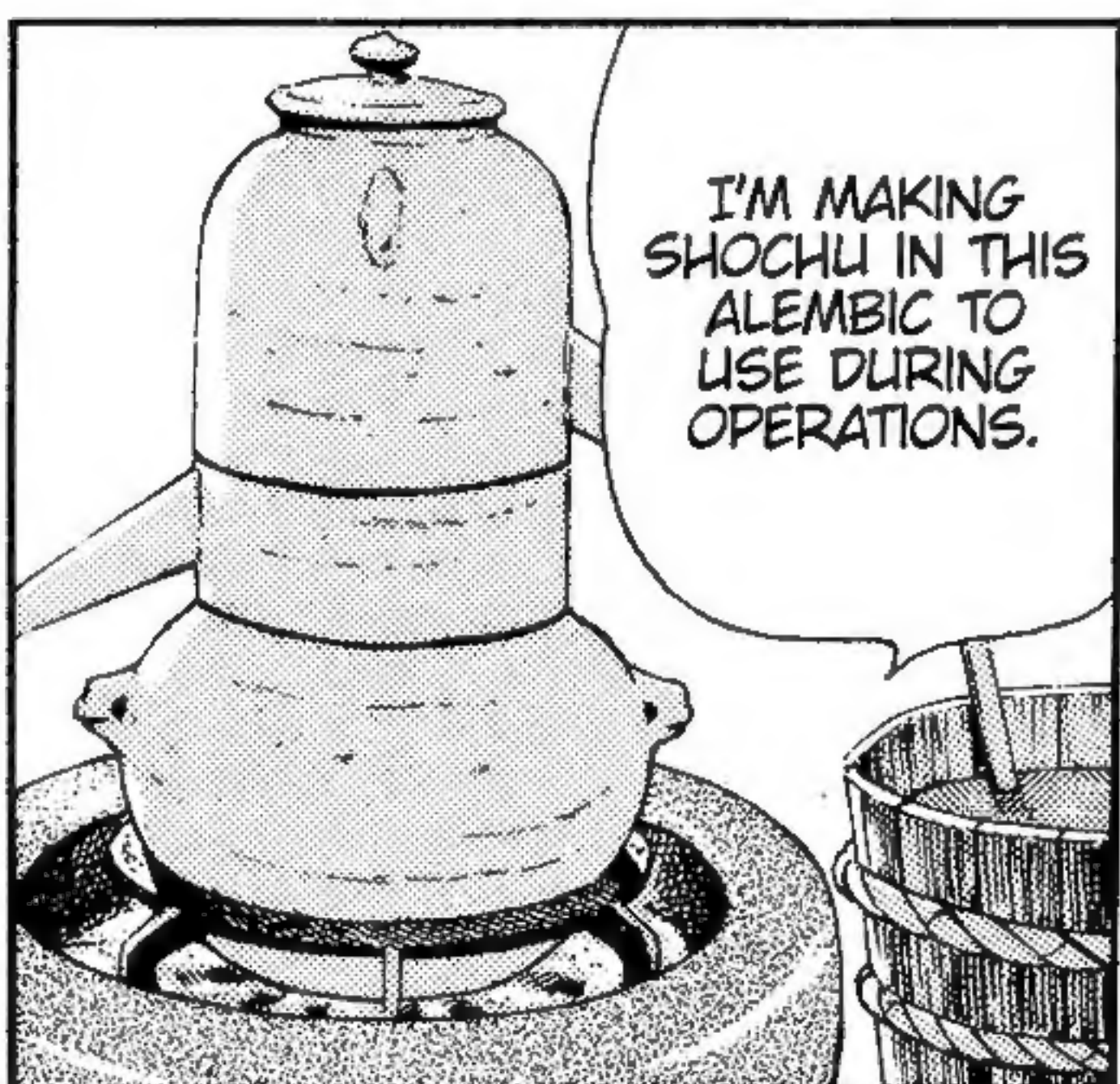


...IN THE  
WORLD THAT  
SHOULD HAVE  
BEEN LONG  
IN THE PAST.

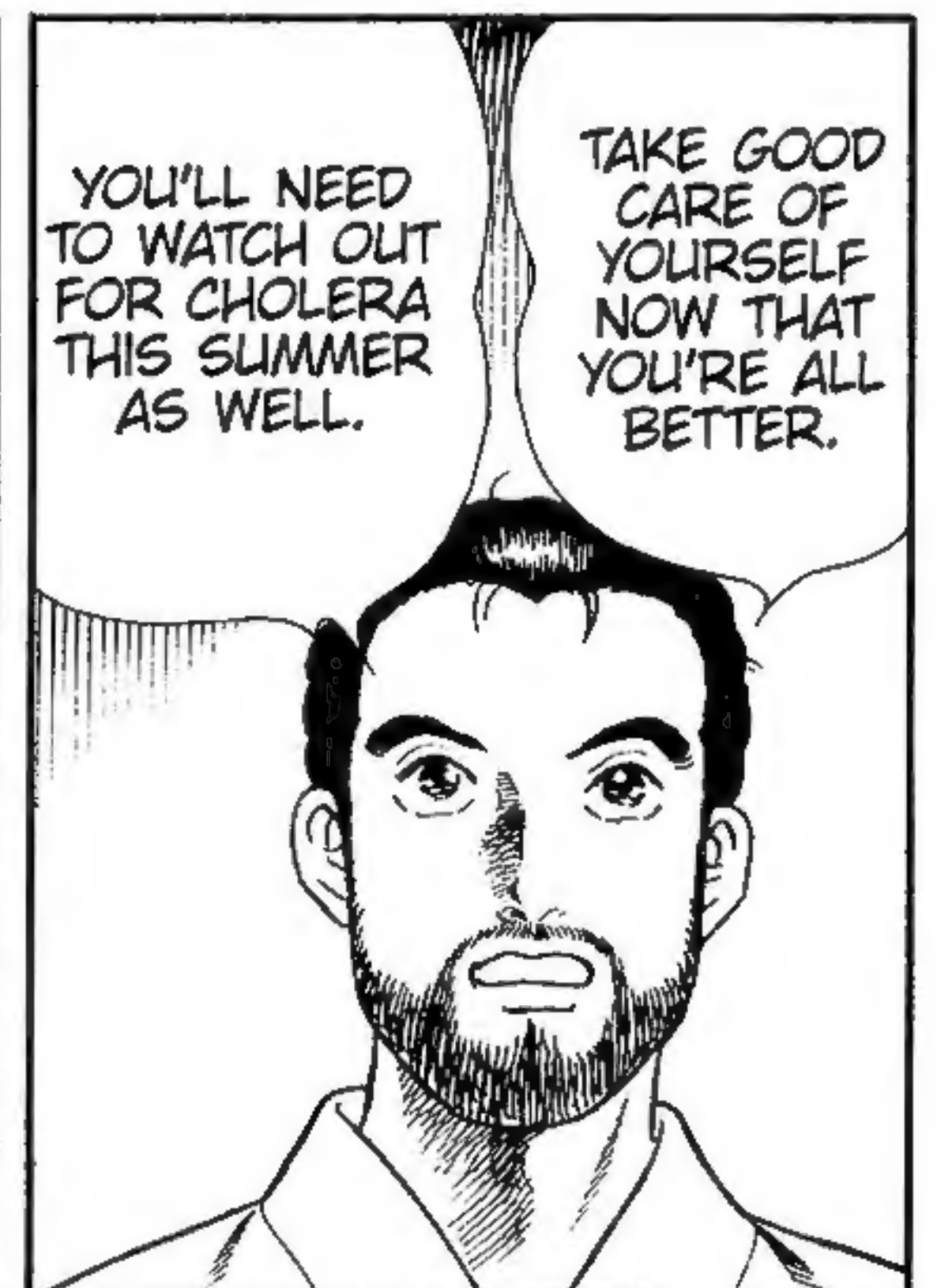
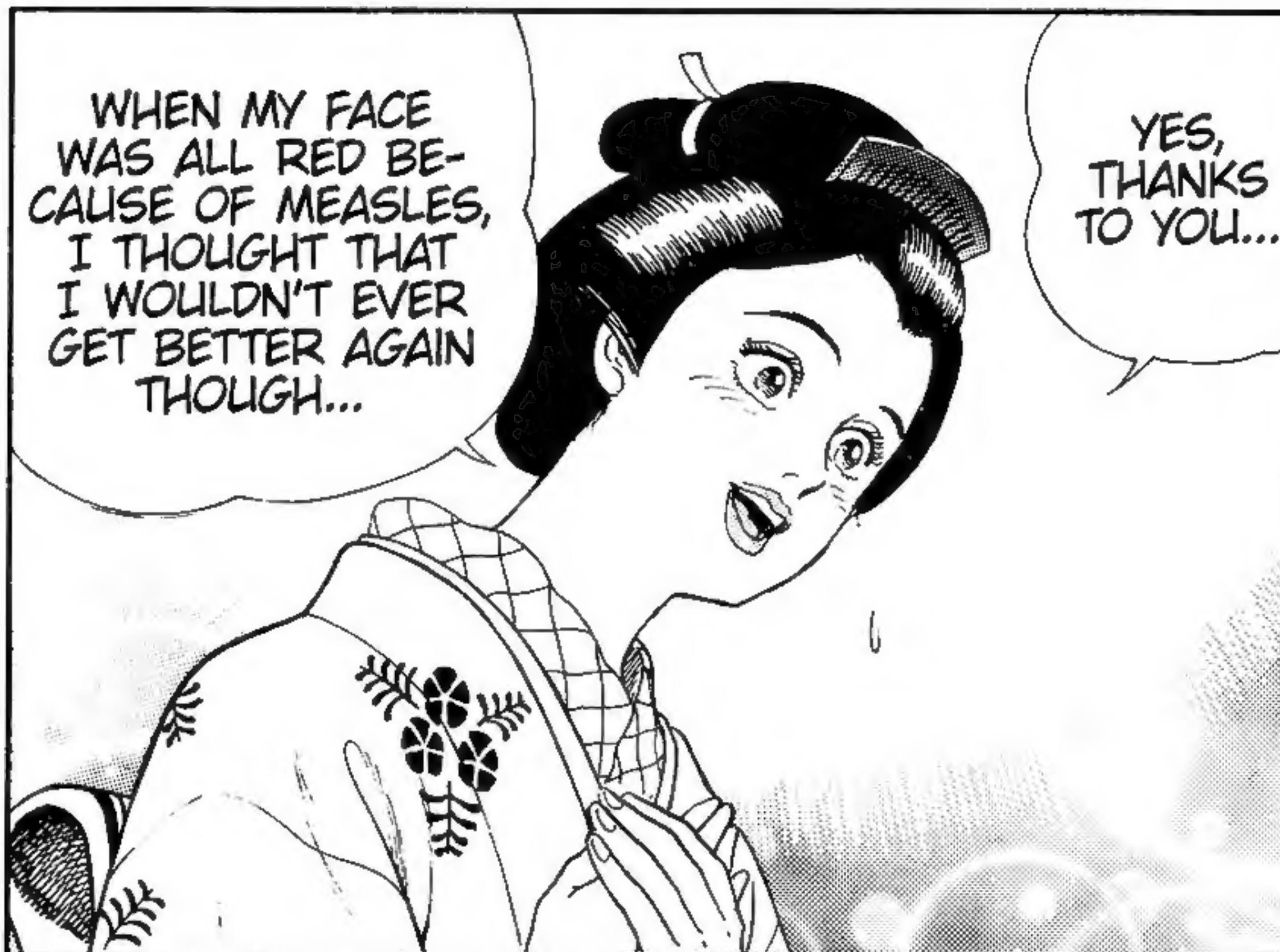
NEVERTHELESS,  
I FIND MYSELF  
HERE NOW...



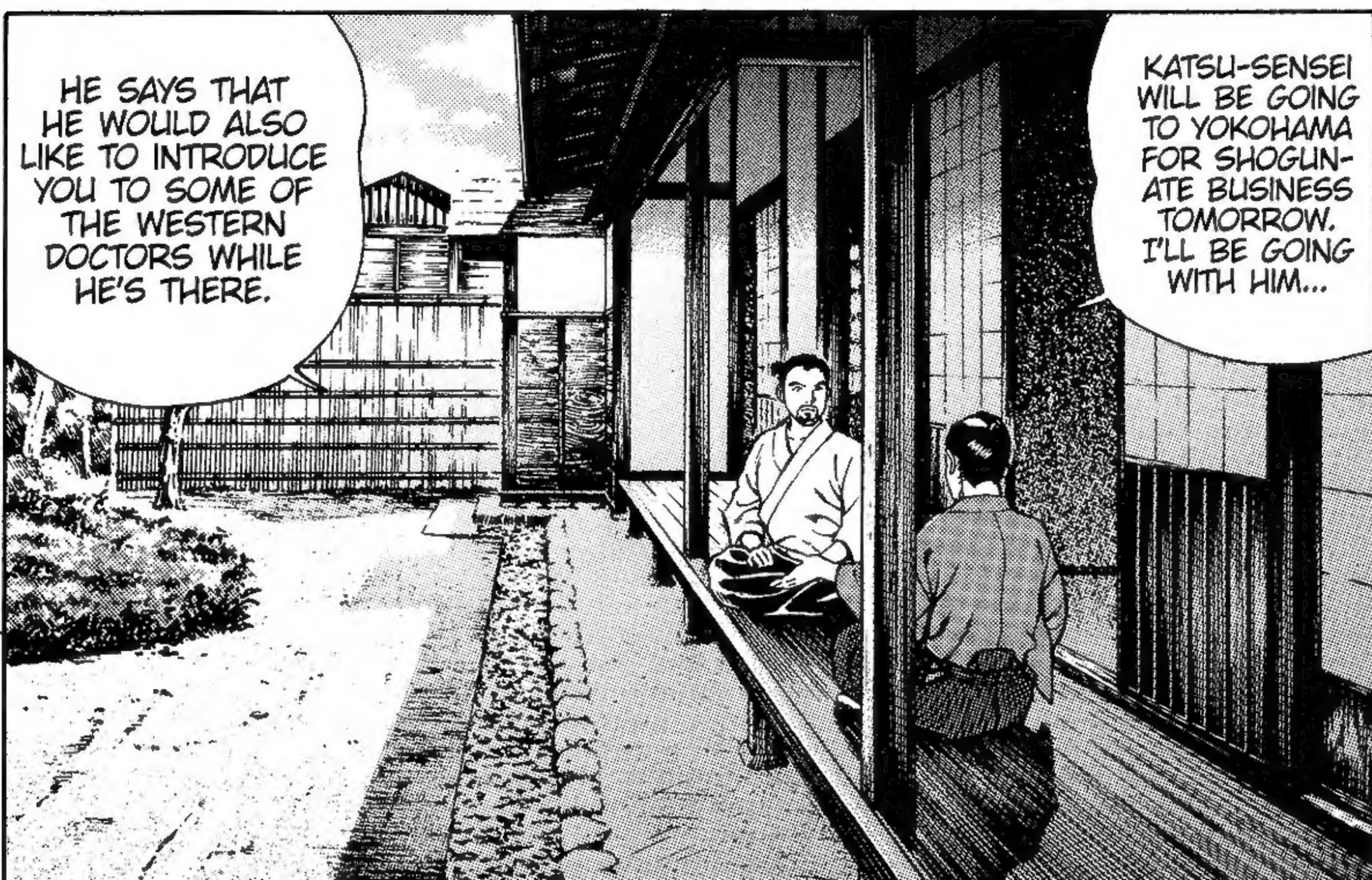




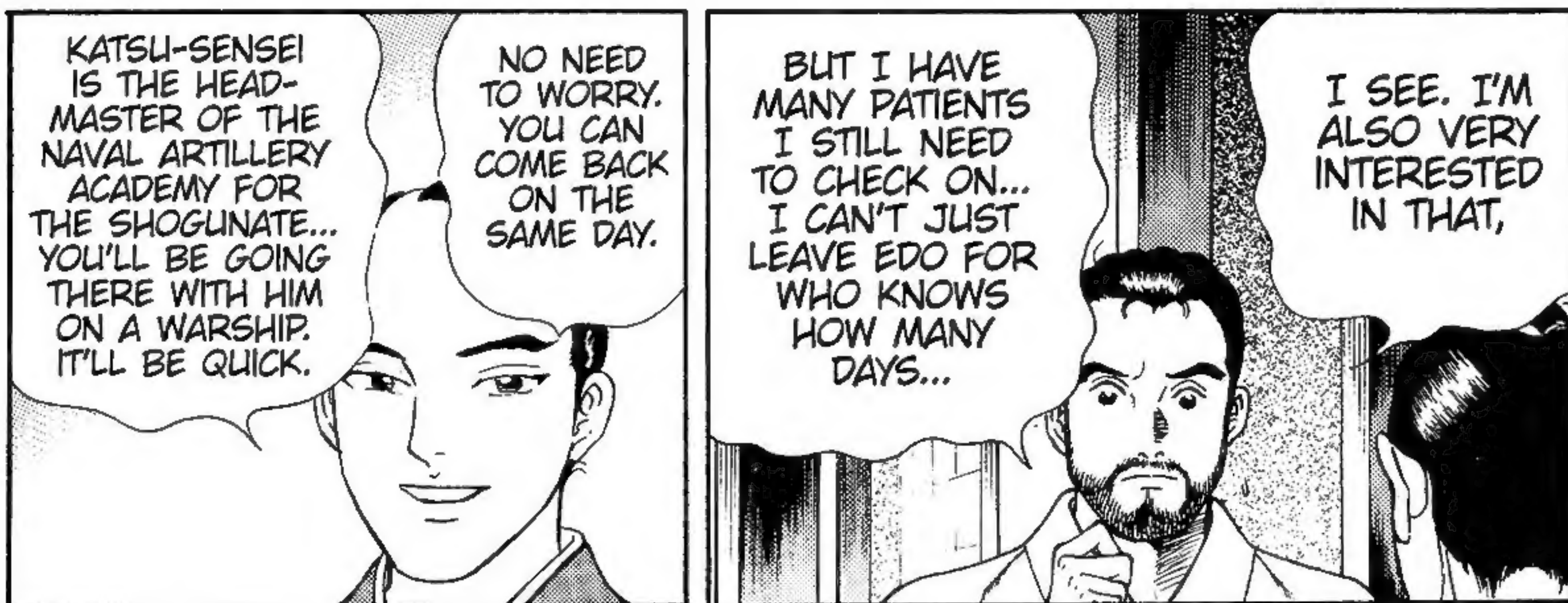








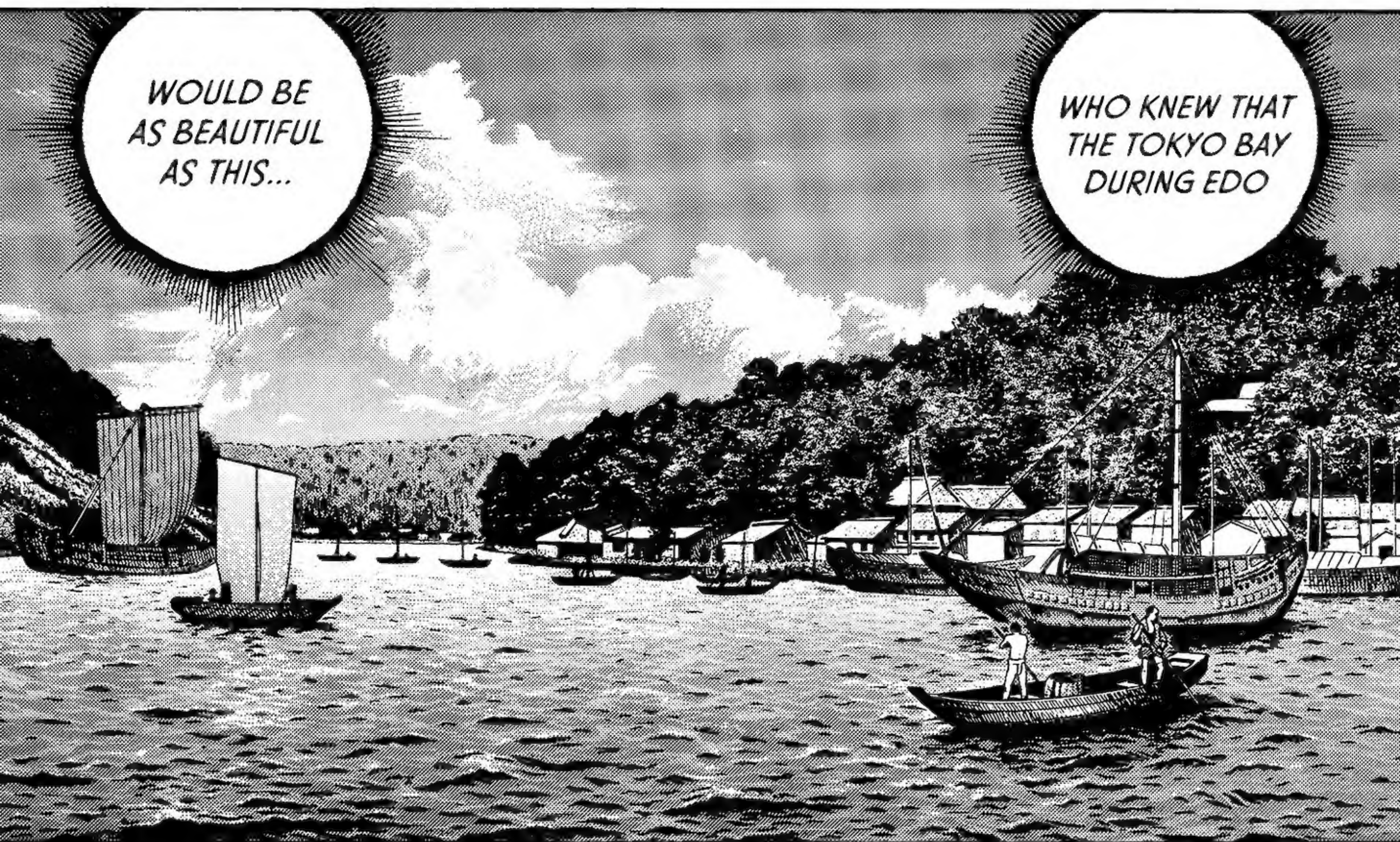




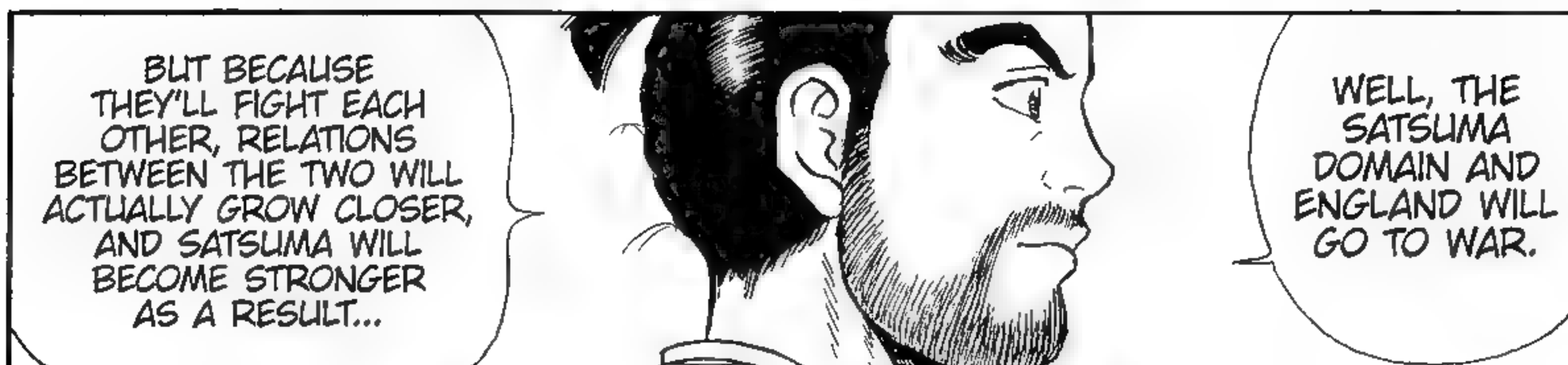




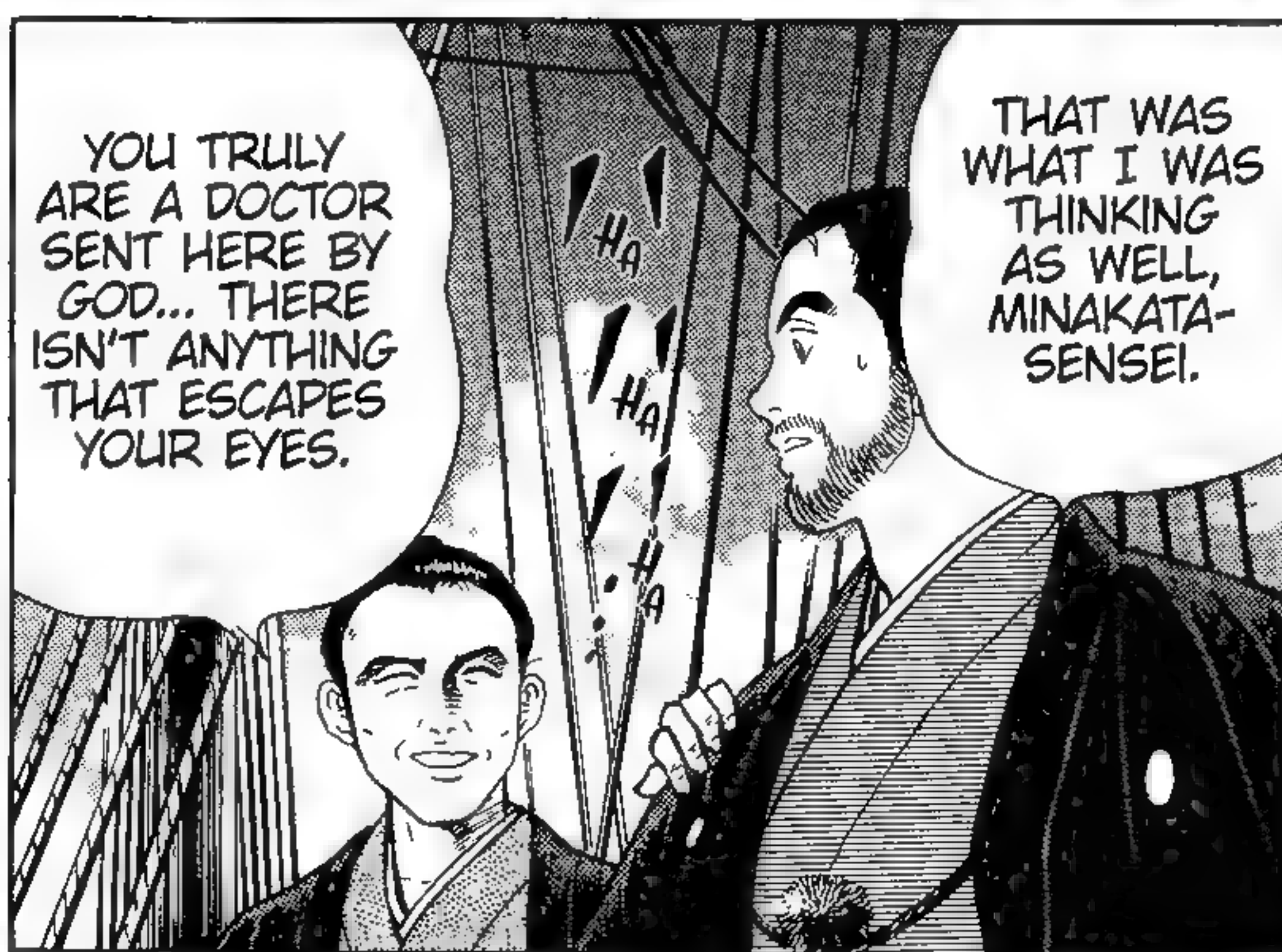























AND THIS IS THE  
DOCTOR FROM  
THE AMERICAN  
CONSULATE,  
DR. HEPBURN.




THIS IS THE  
DOCTOR FROM  
THE BRITISH  
LEGATION,  
DR. WILLIAM  
WILLIS.



BUT NORMALLY,  
DR. HEPBURN LIVES IN  
JOBUTSU TEMPLE IN  
KANAGAWA AND GIVES  
JAPANESE PATIENTS  
FREE TREATMENT  
AS A MEDICAL  
MISSIONARY.

DR. HEPBURN AND  
DR. WILLIS WERE  
INVOLVED IN THE  
TREATMENT FOR THE  
WOUNDED BRITISH  
MEN WHEN THE  
INCIDENT HAPPENED  
AT NAMAMUGI.

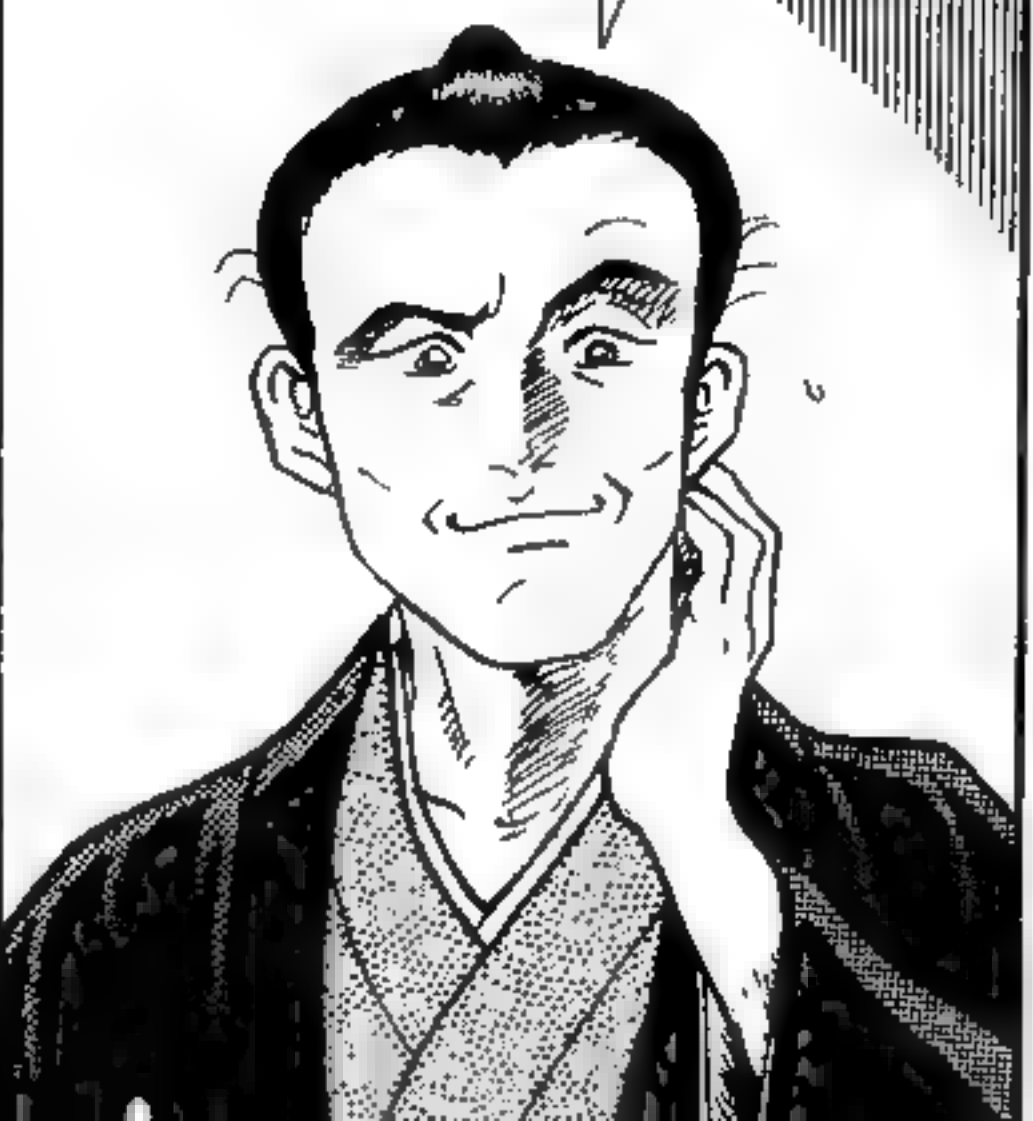


My name is Jin Minakata.  
I'm a surgeon  
at Yushima in Edo-city.

私の名は南方仁  
江戸の湯島で医師を  
しています

How do you do?  
Dr. Willis and Dr. Hepburn,  
I'm pleased to meet you.

はじめまして  
ウイリス先生、ヘボン先生  
お会いできて光栄です




Surprising...  
He speaks much  
better than I do.

驚いたね...  
おいらより ずっと  
うまいじゃねえか...



Just a little...  
Only usual conversation.

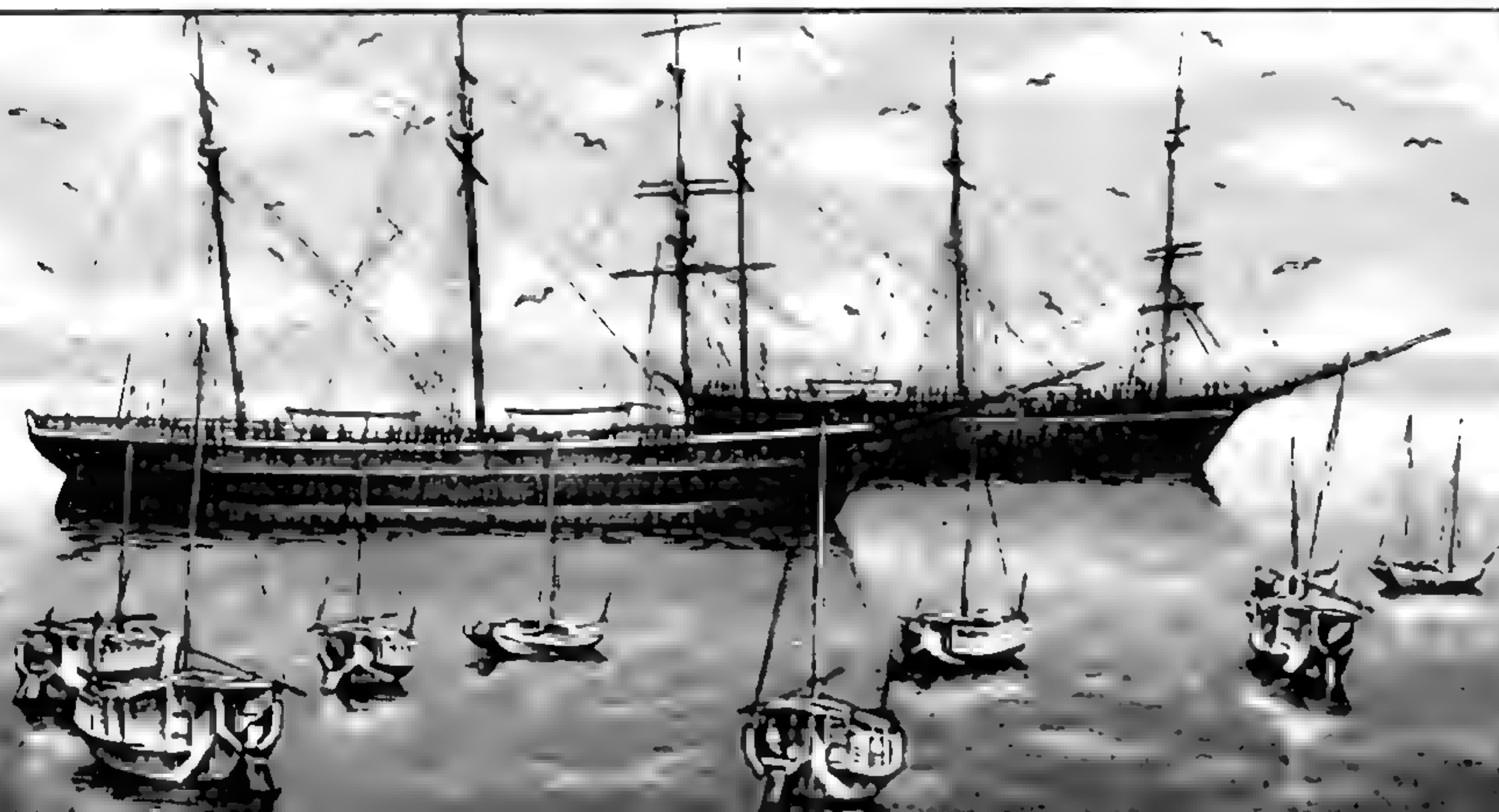
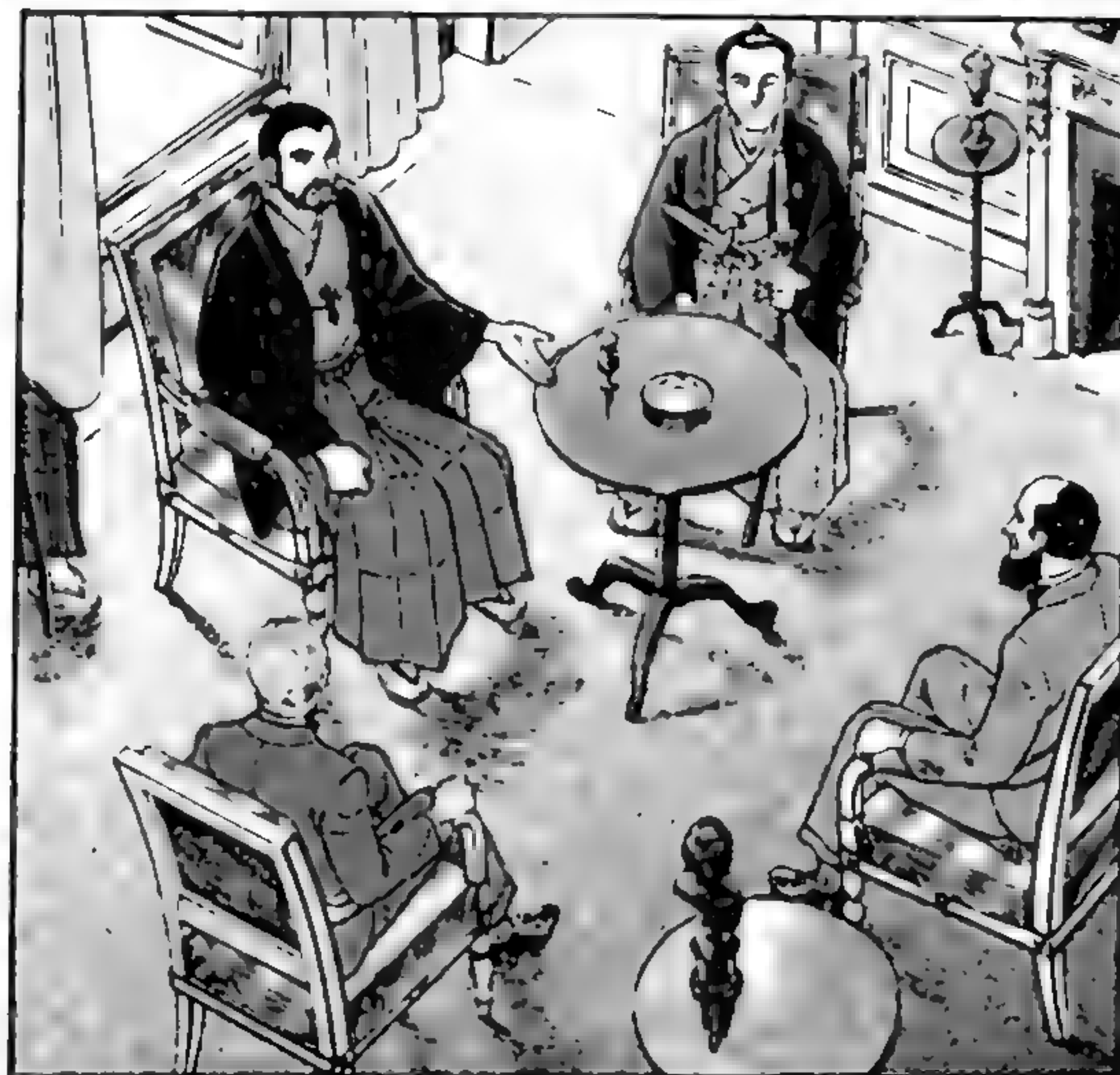
うまくはありませんが  
日常会話くらいなら  
話せます



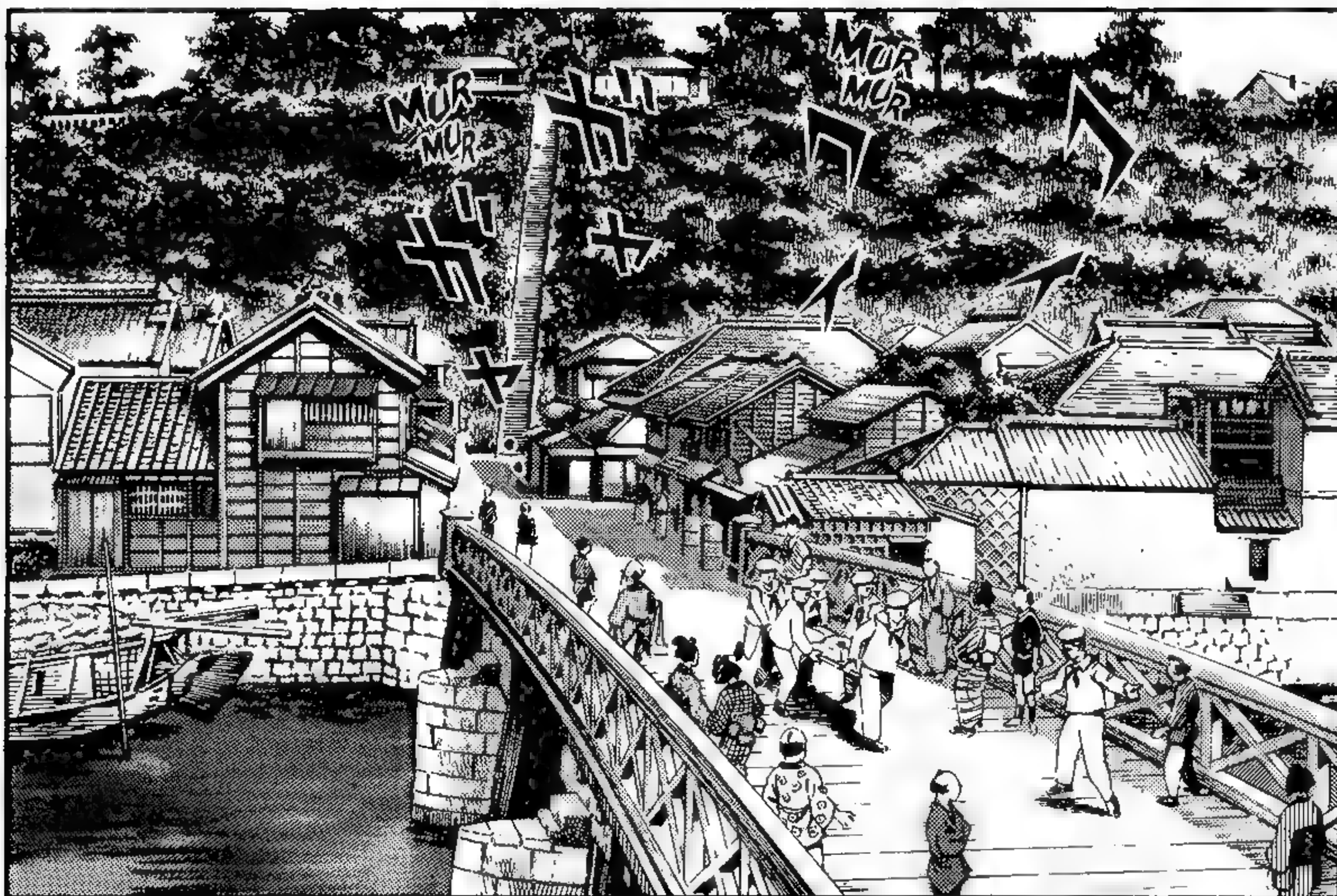
Oh, you speak  
in English well.

あなたは英語が  
しゃべれるの  
ですか？

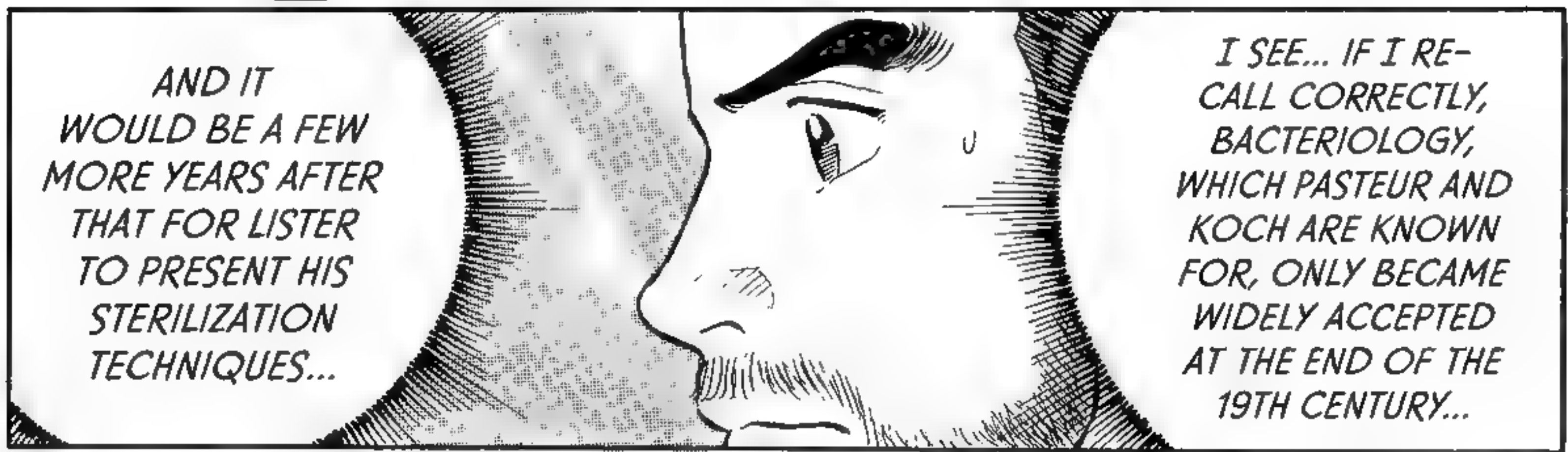




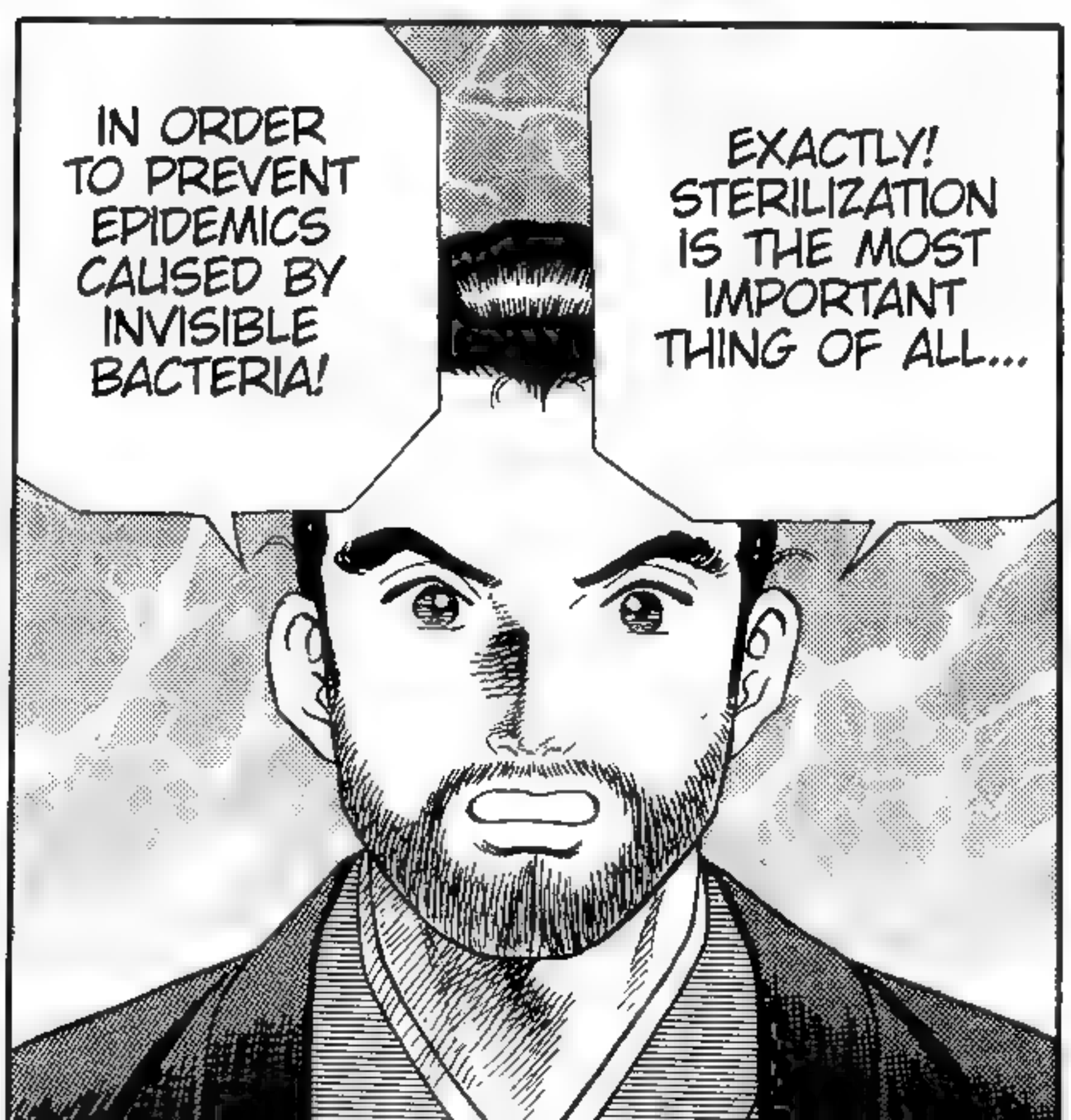




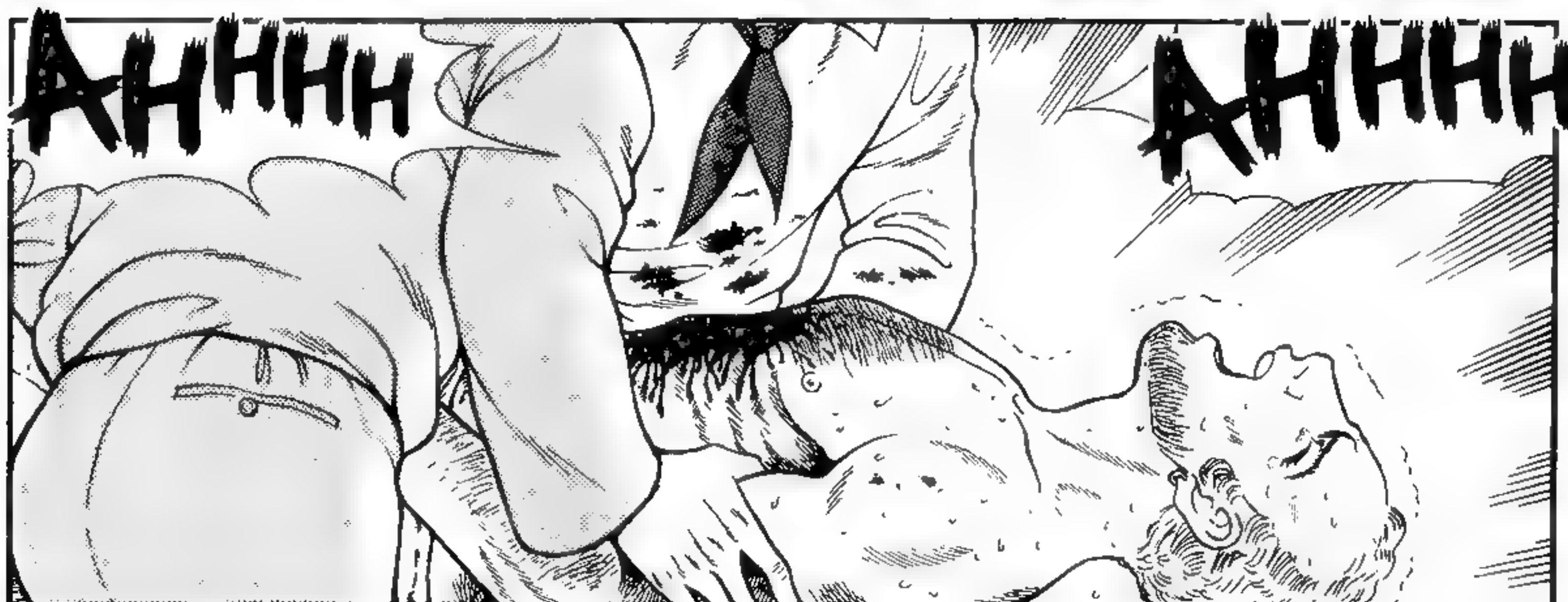




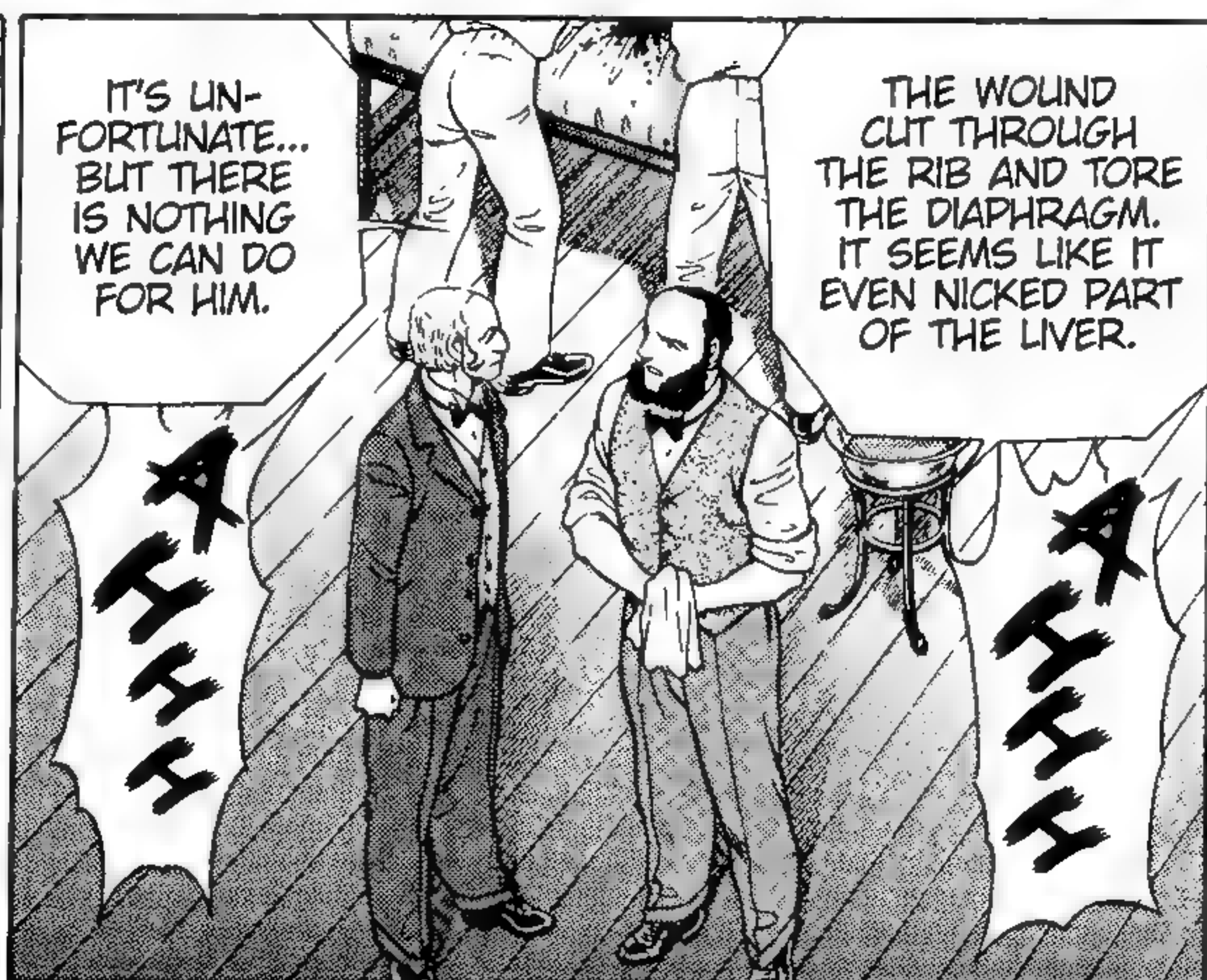
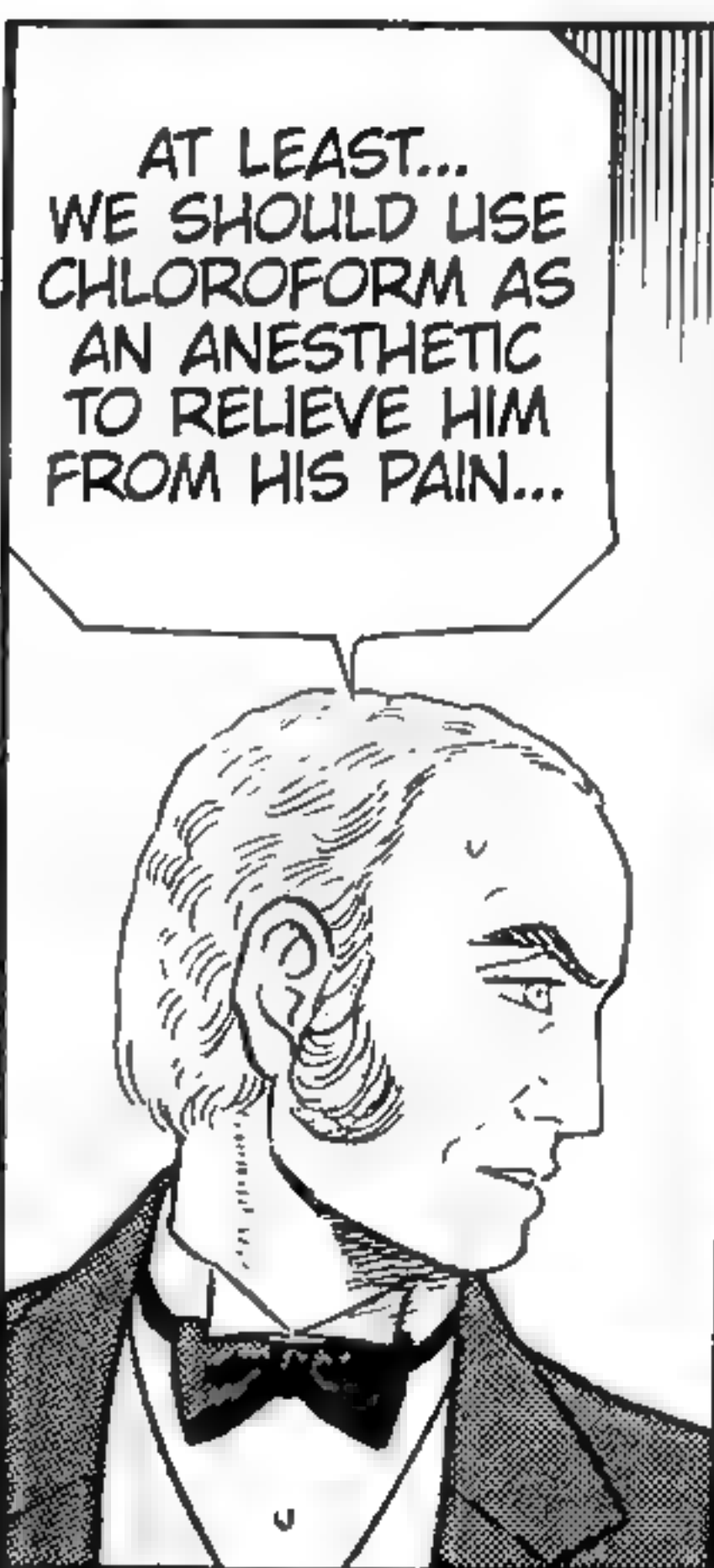
\*SHOCHU IS A JAPANESE DISTILLED BEVERAGE LESS THAN 45% ALCOHOL BY VOLUME.



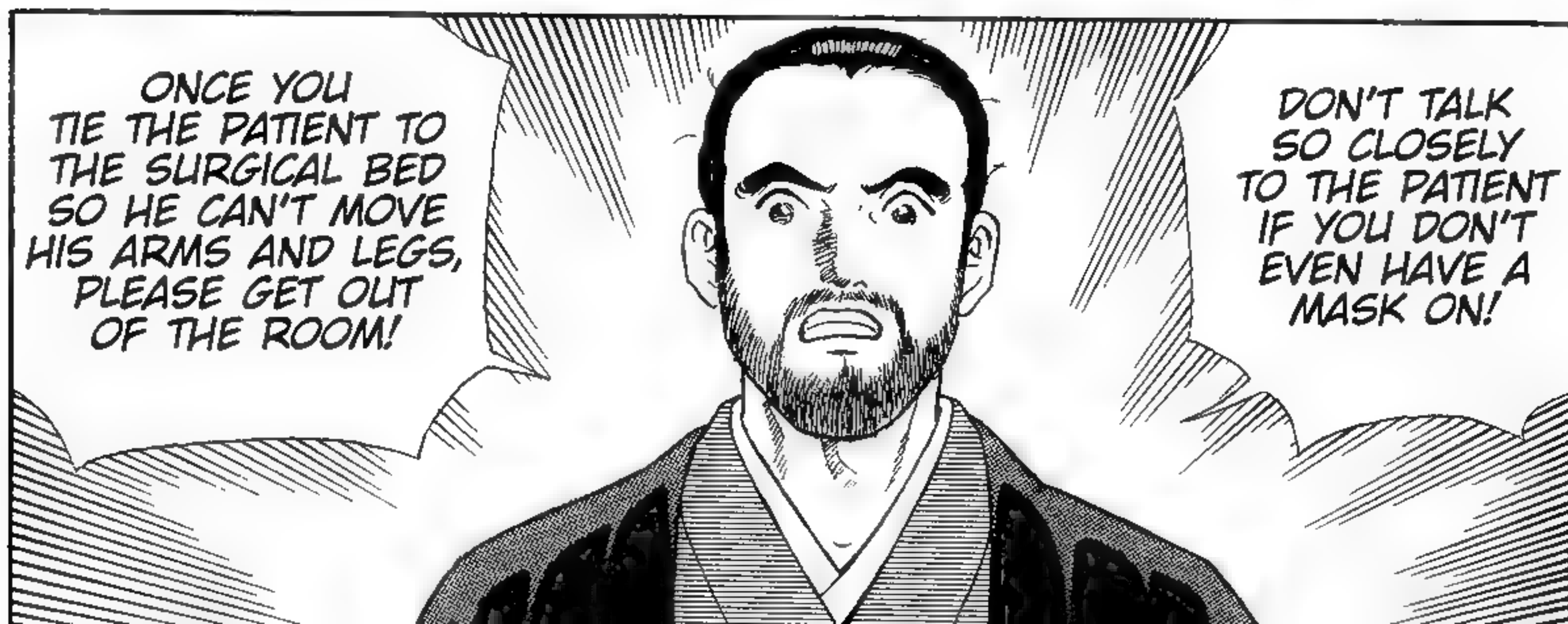
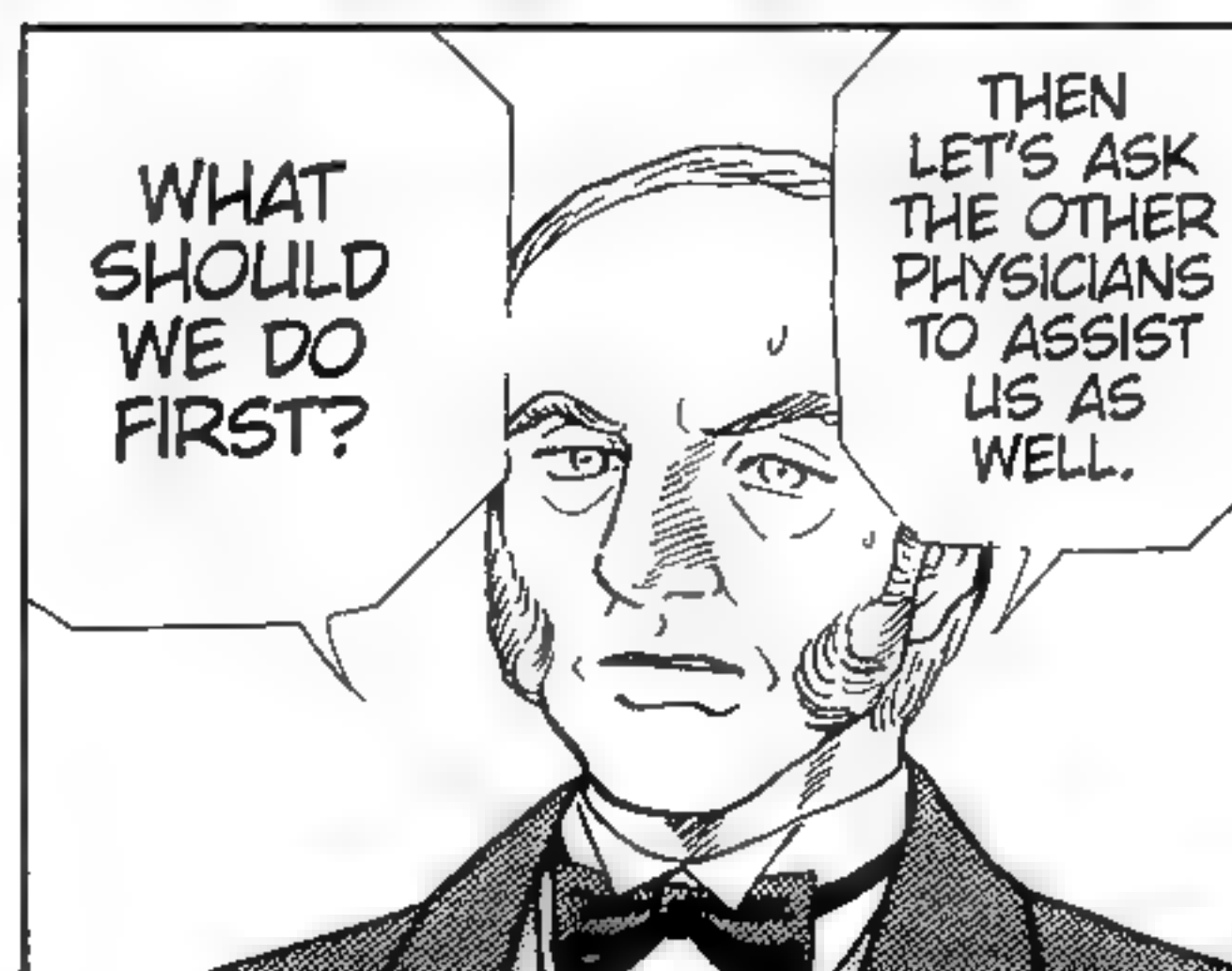




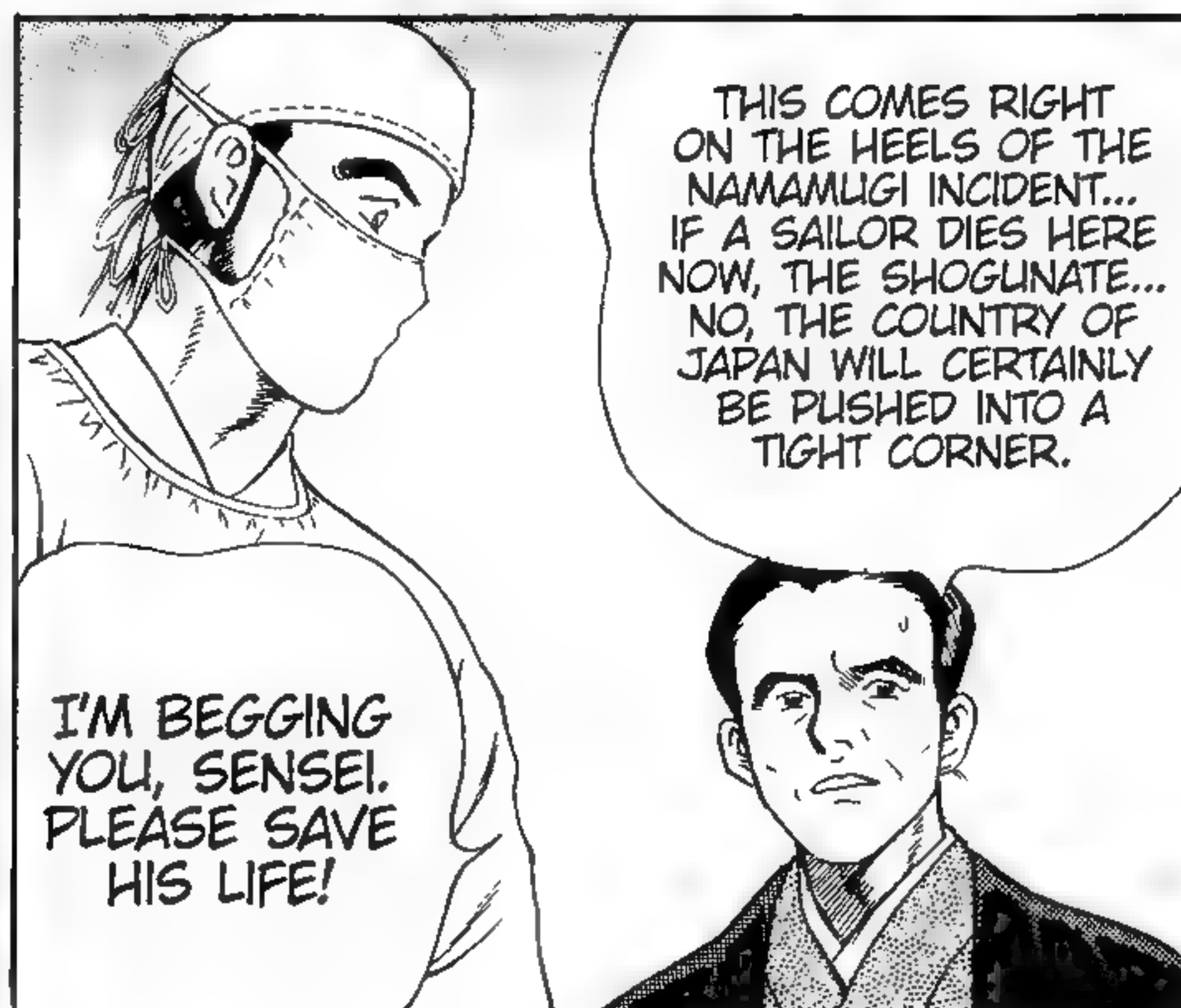








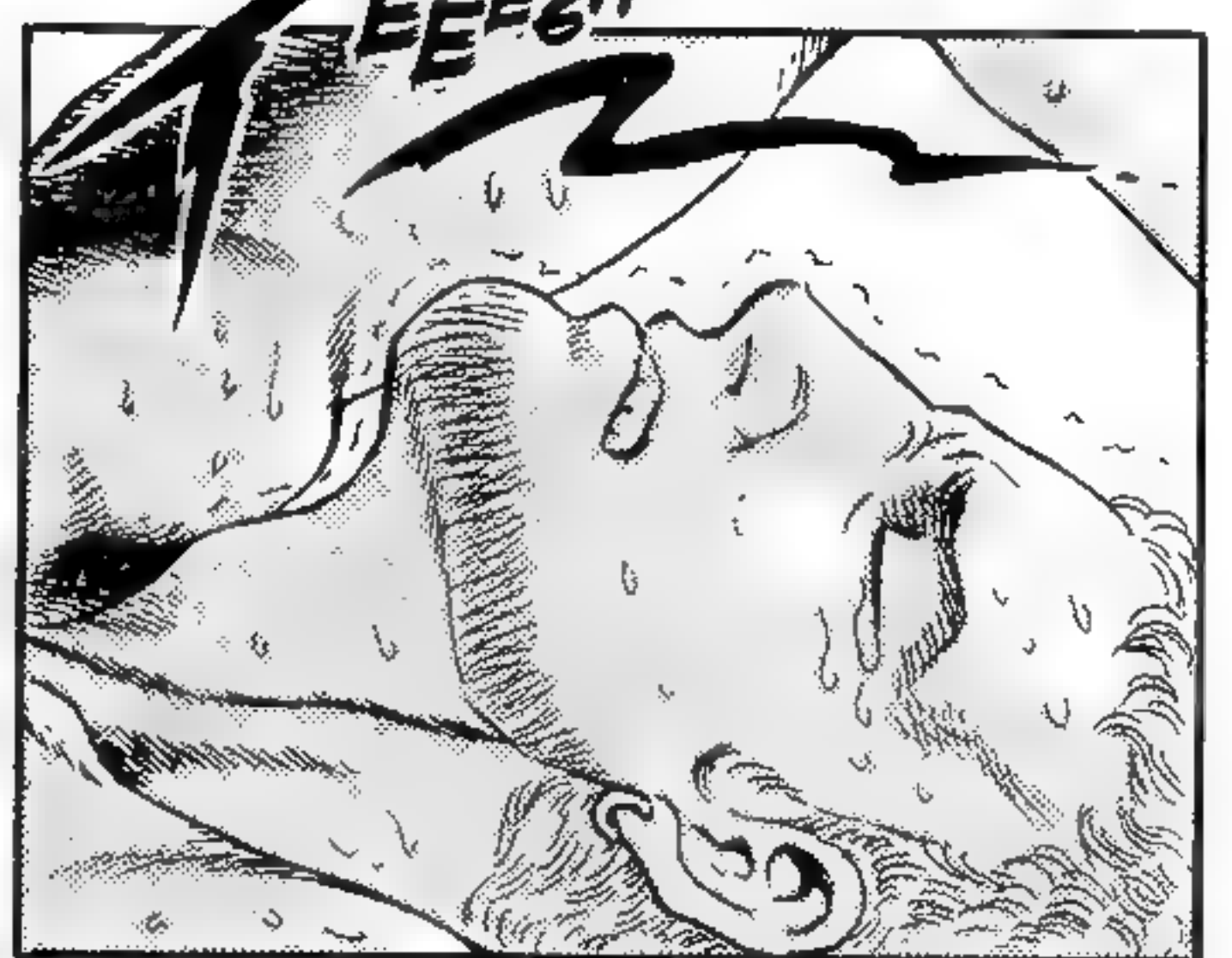
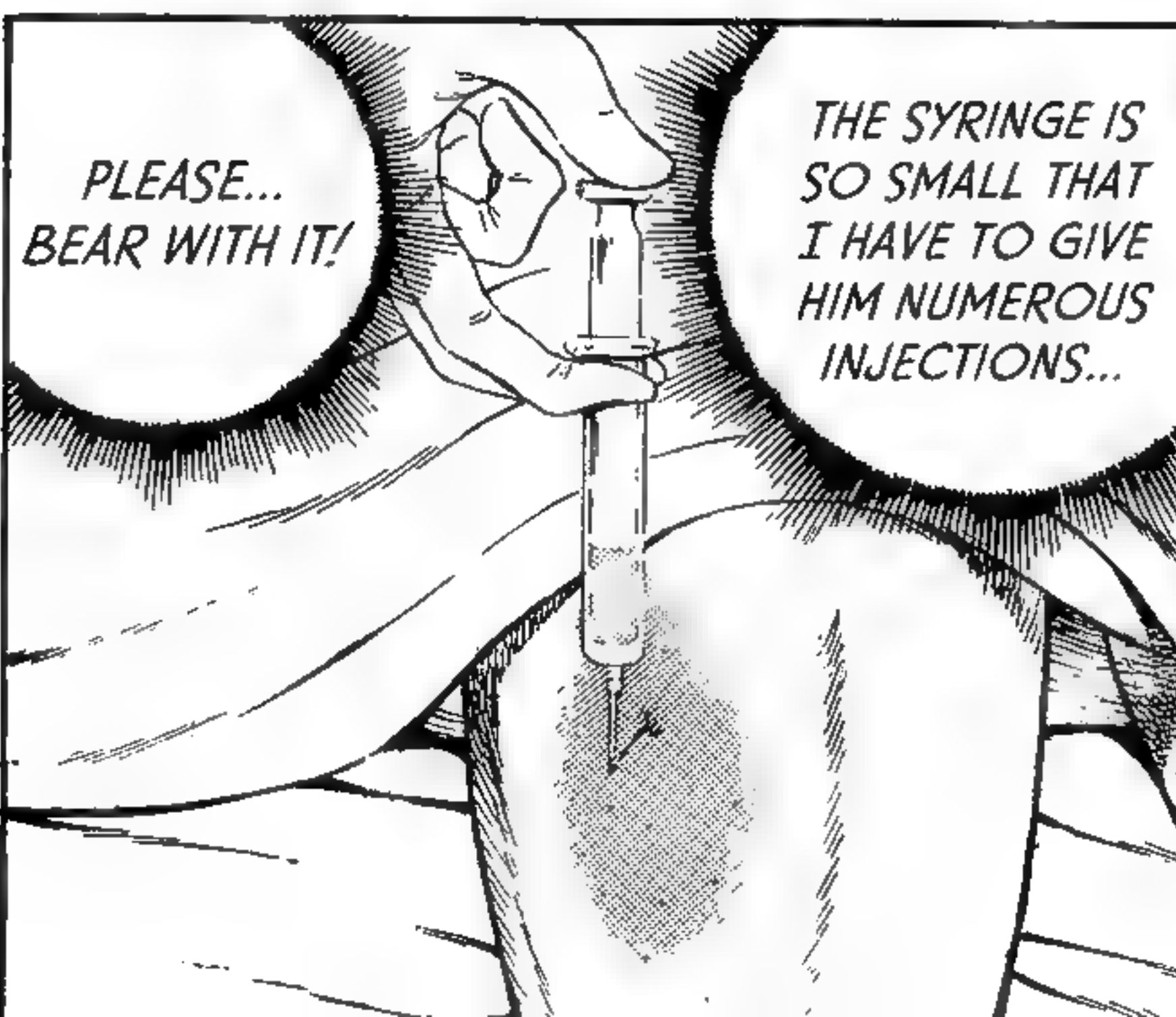
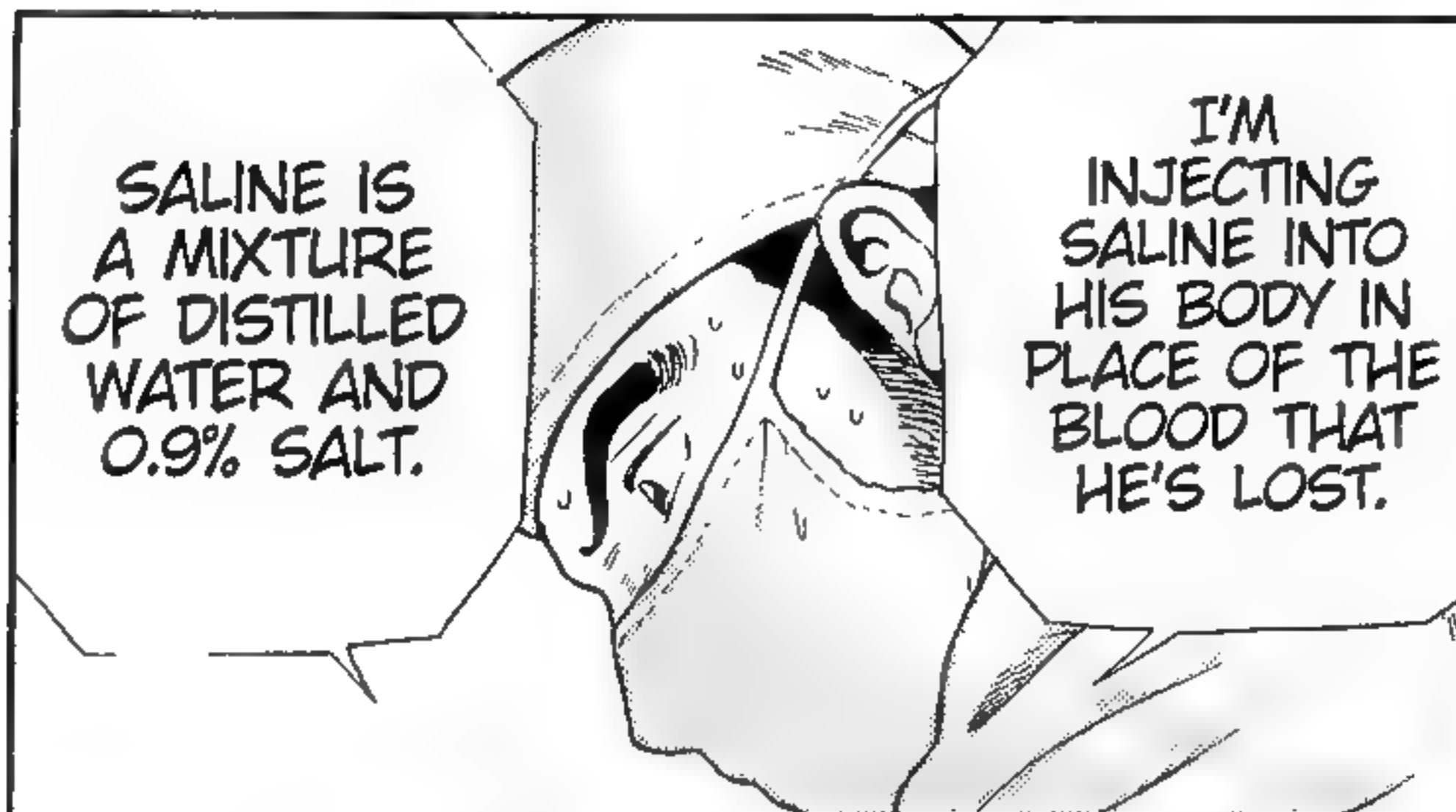
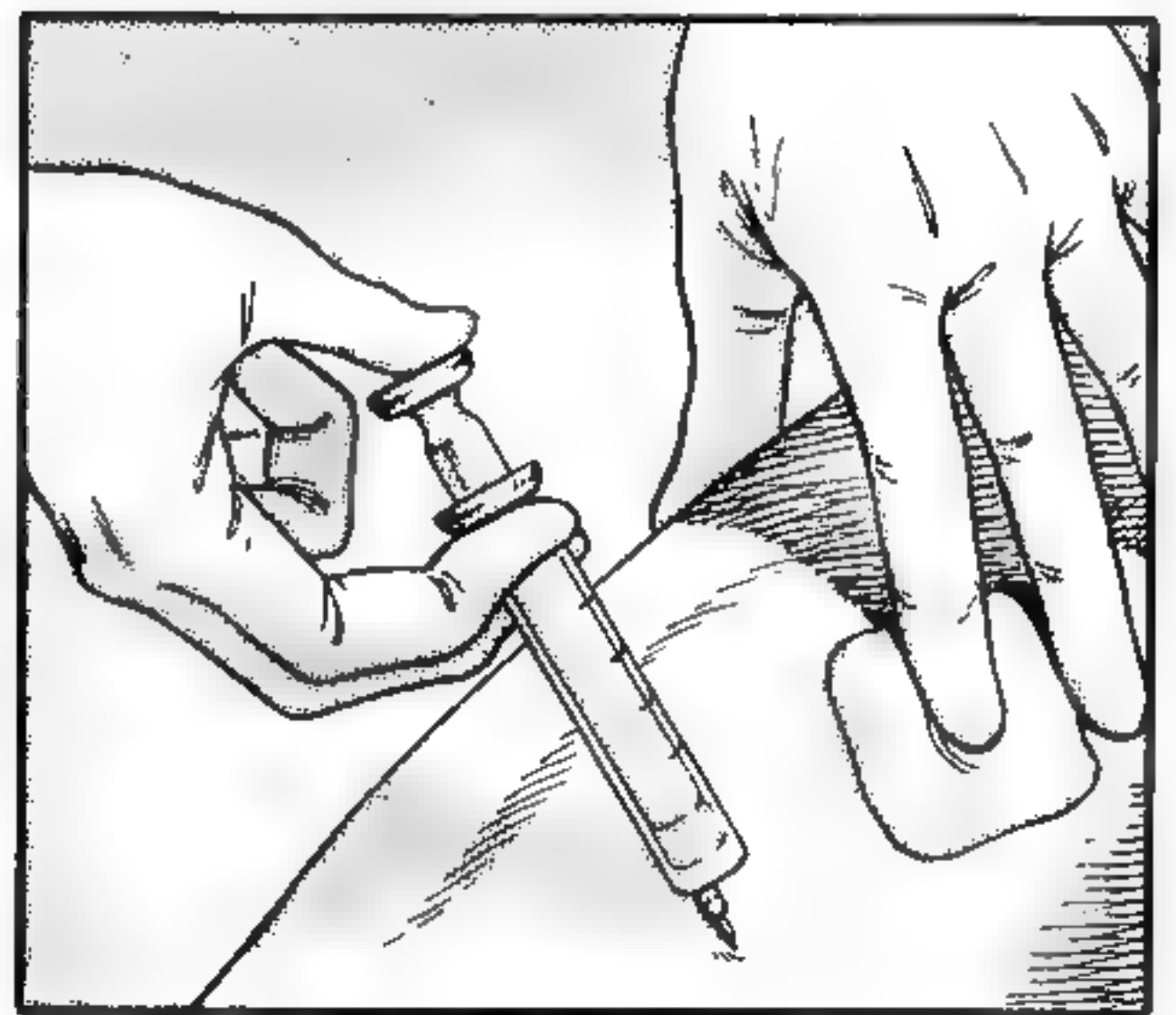
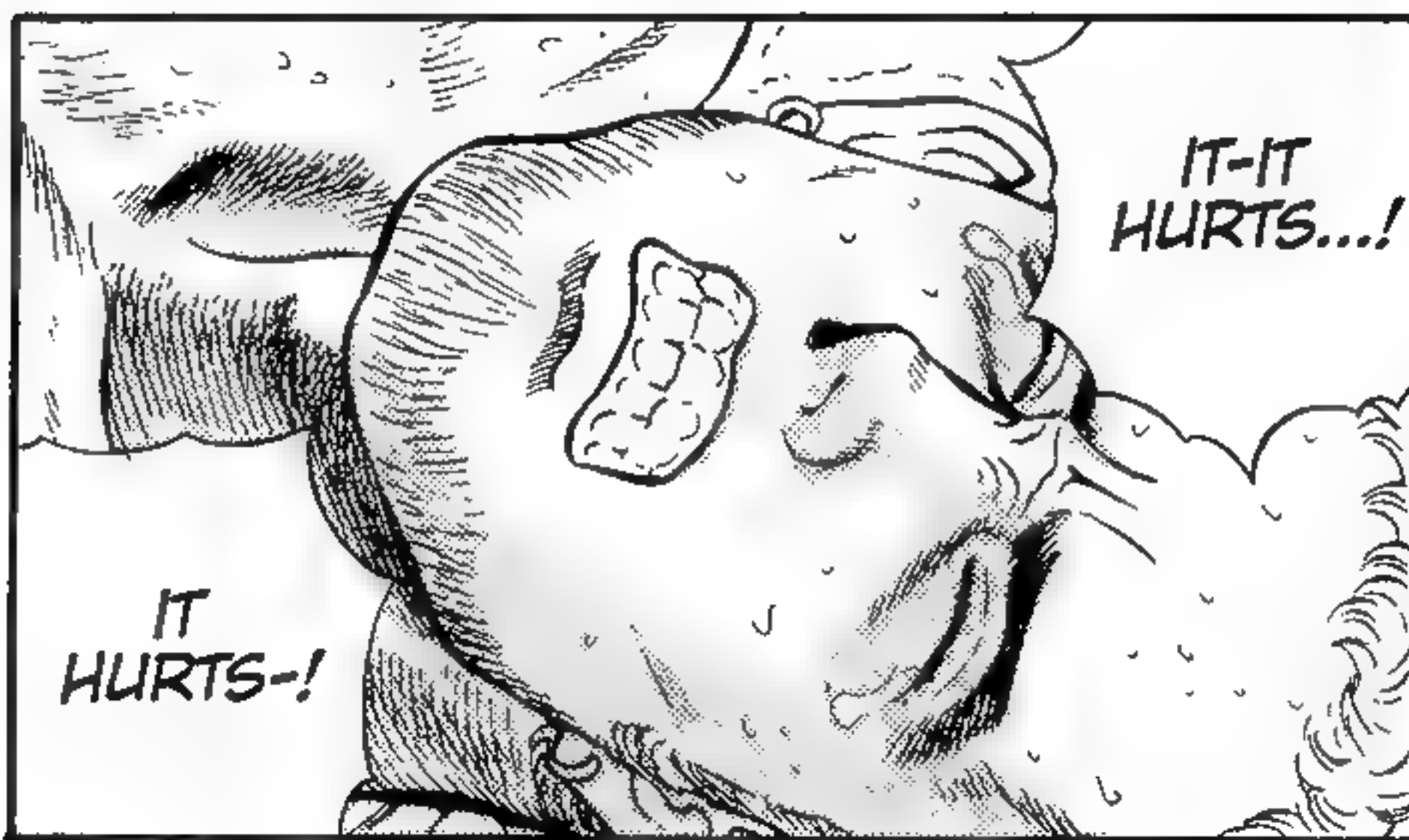




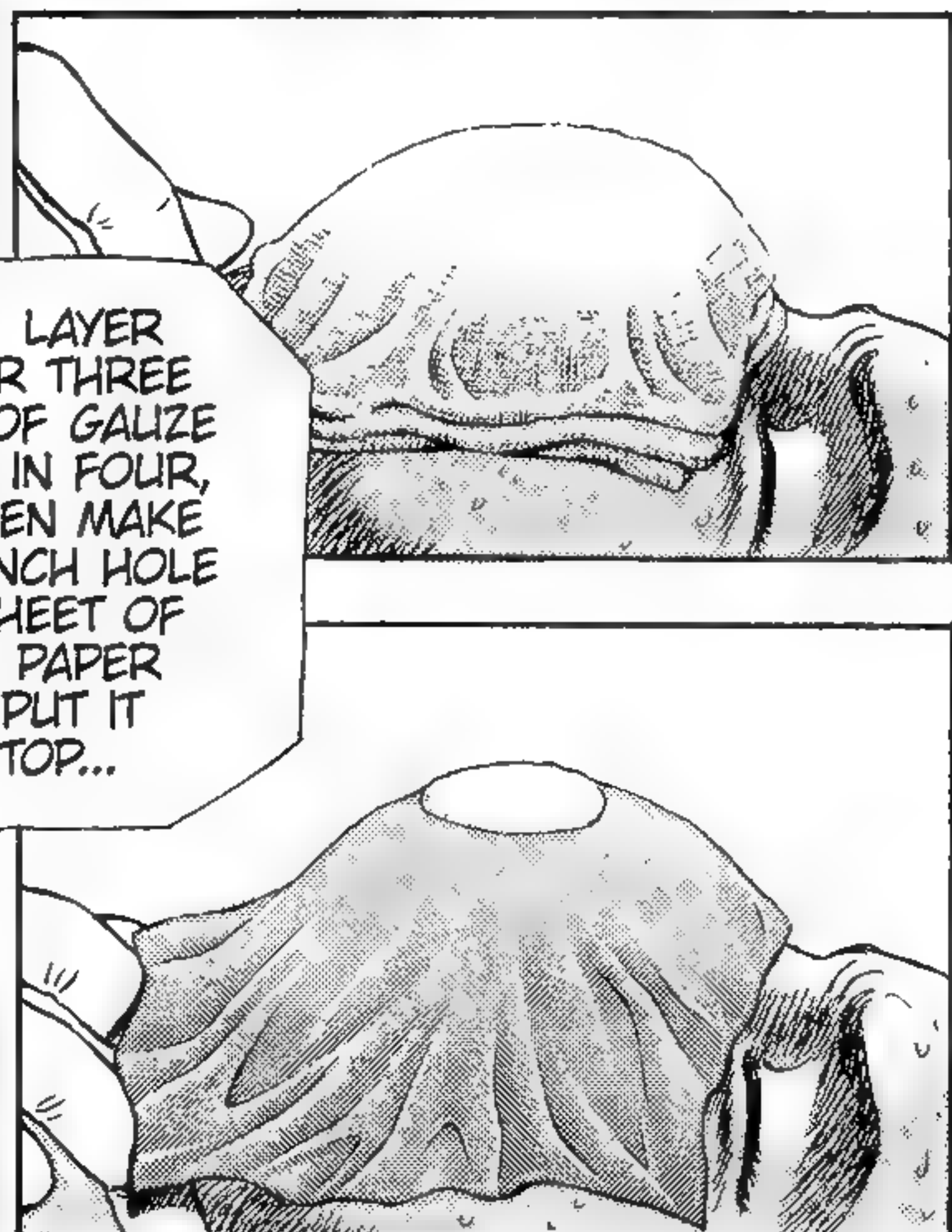
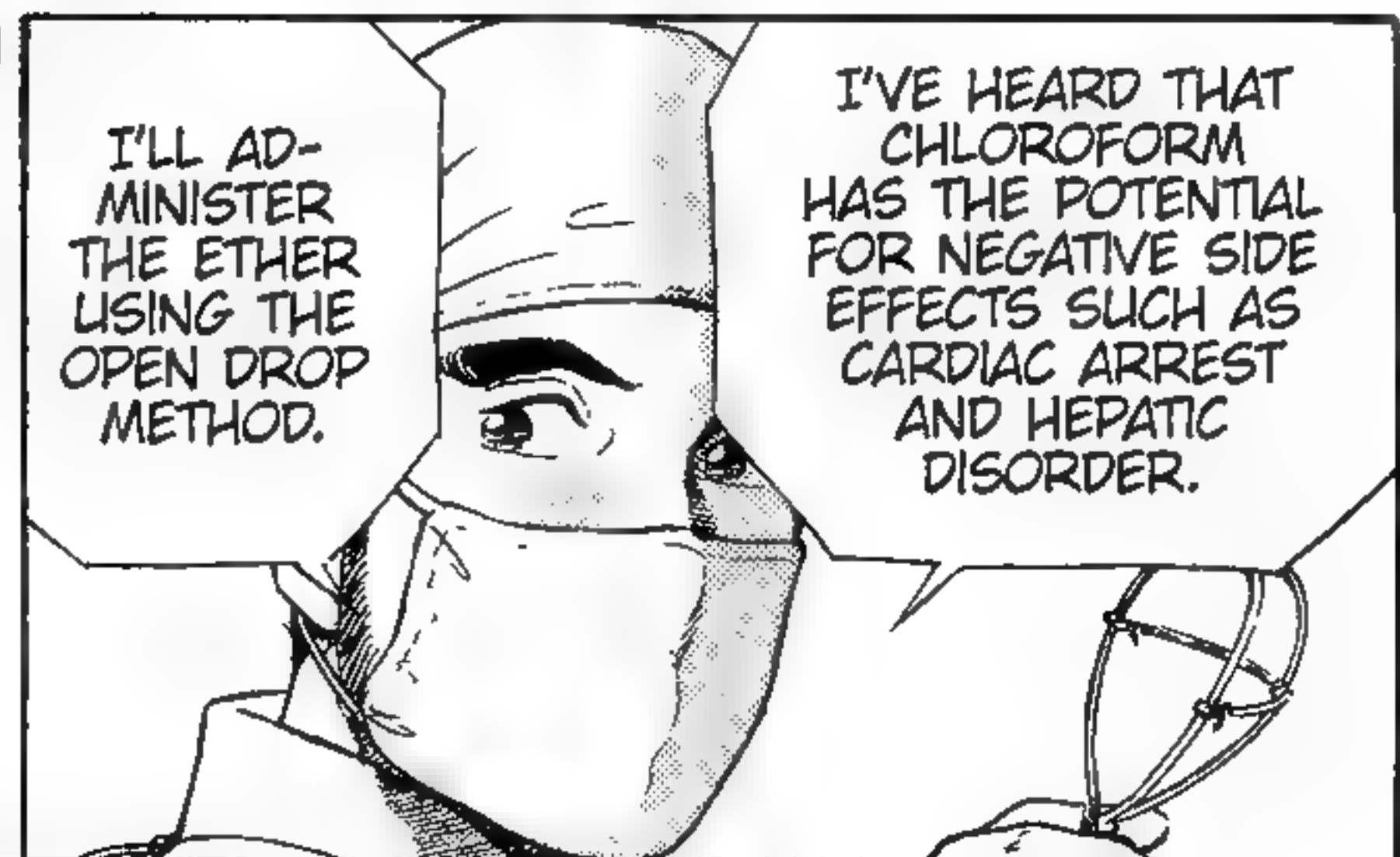
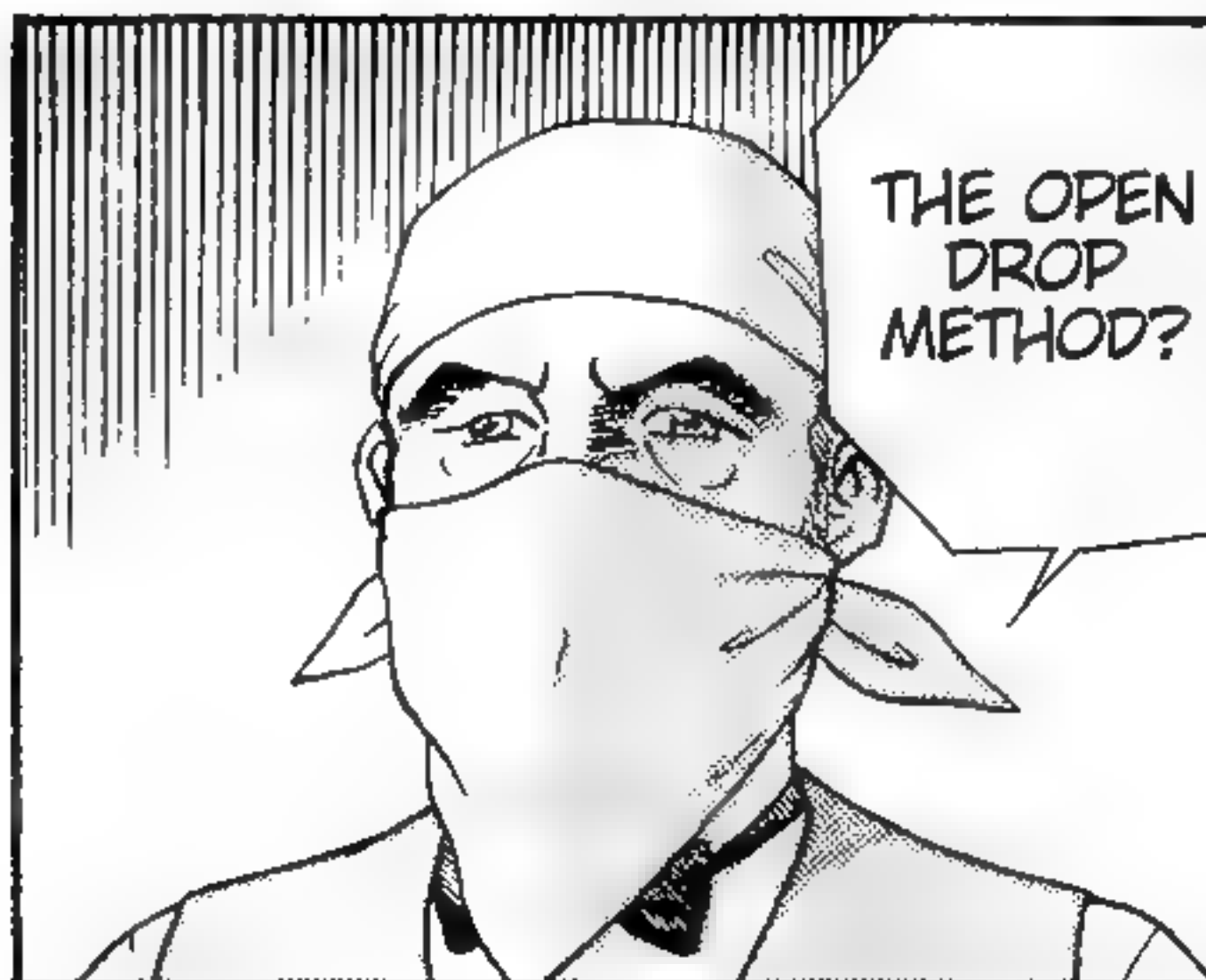
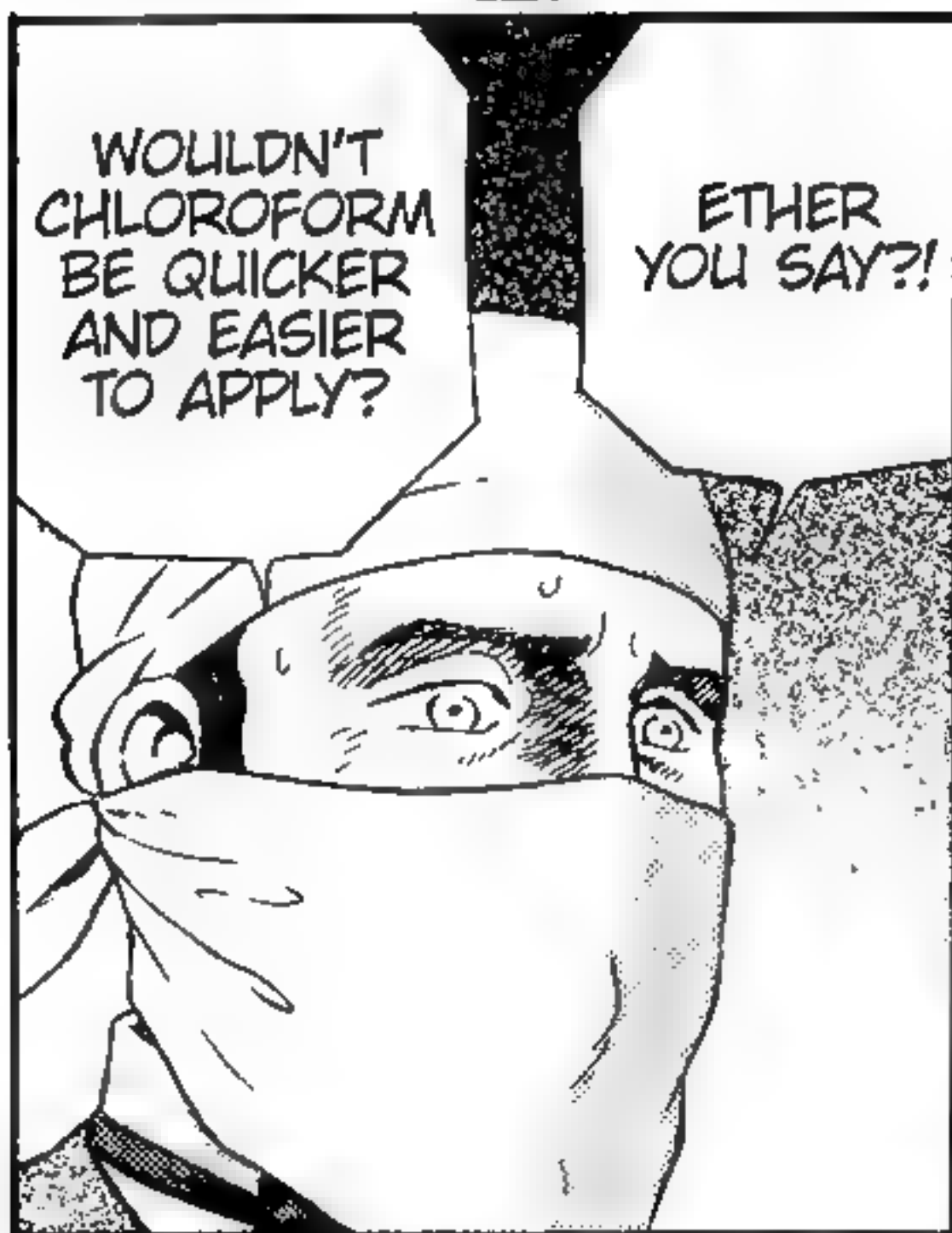




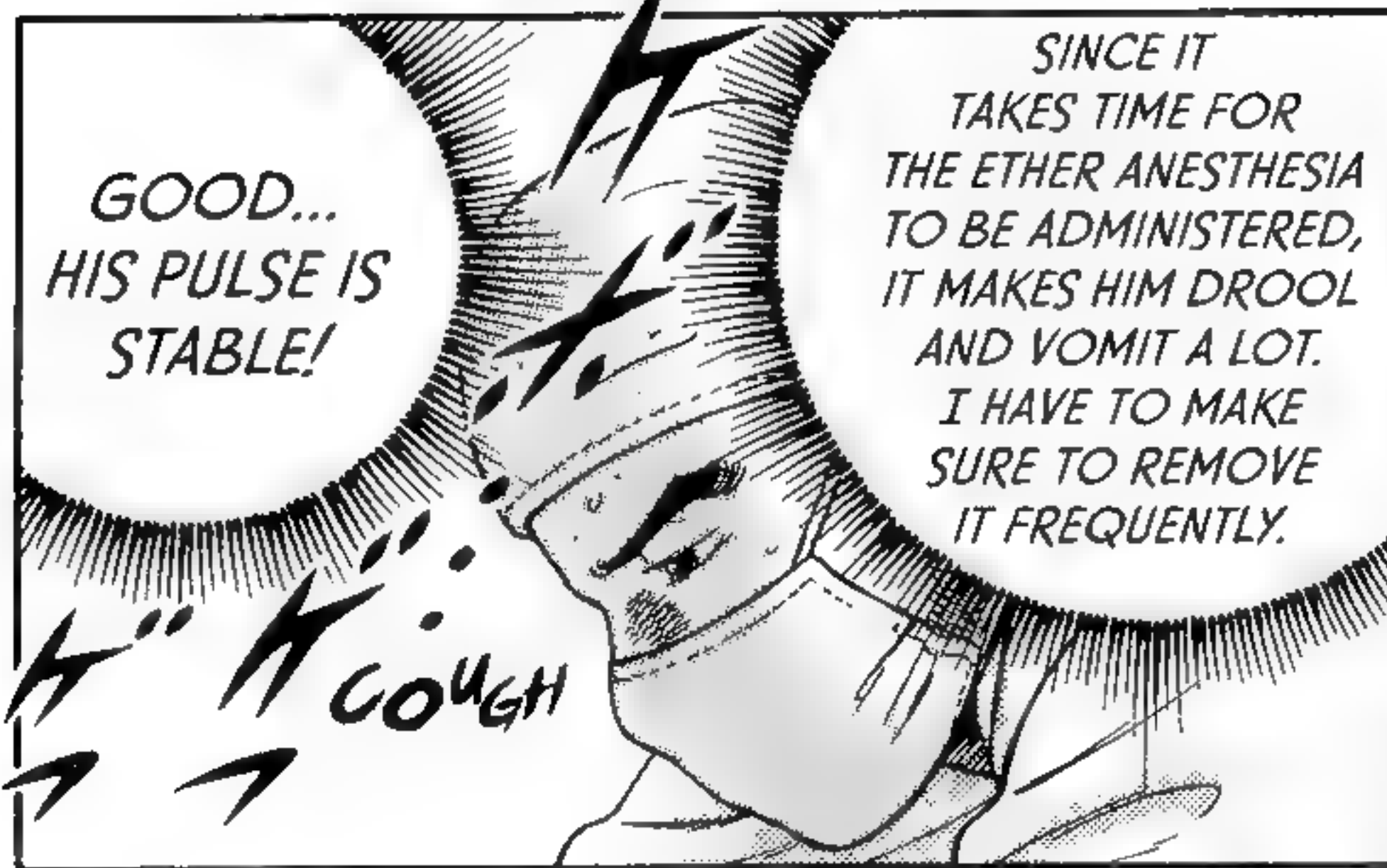






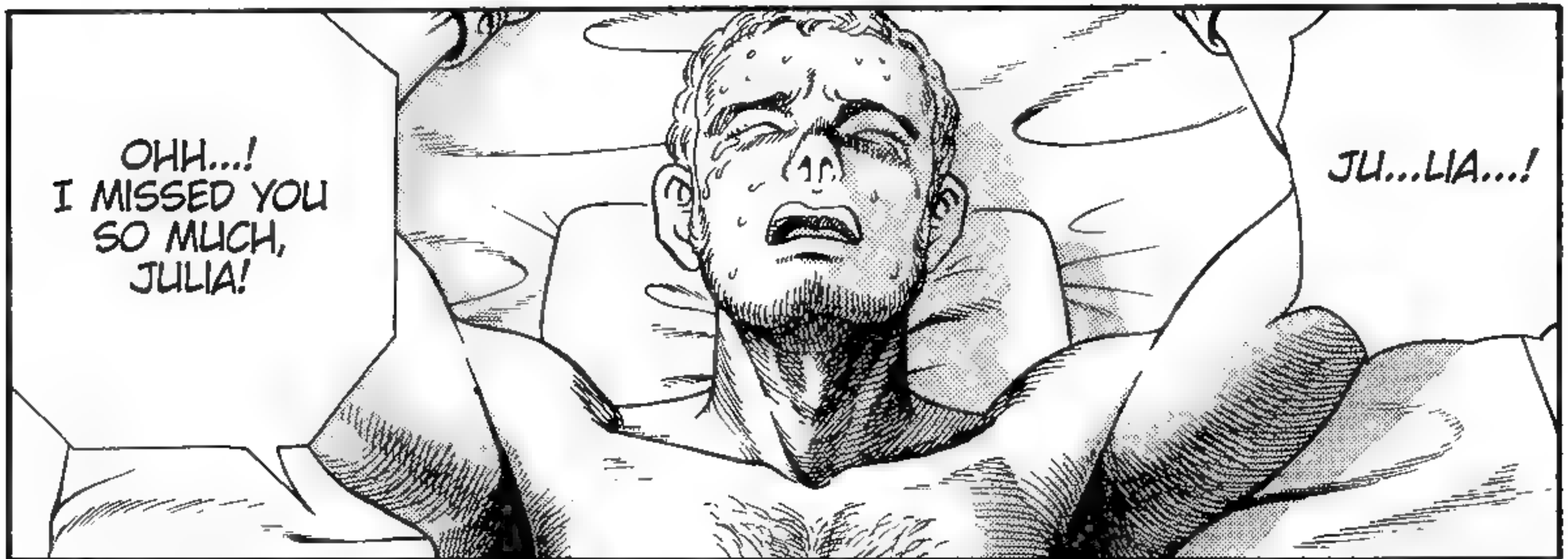






GOOD...  
HIS PULSE IS  
STABLE!

SINCE IT  
TAKES TIME FOR  
THE ETHER ANESTHESIA  
TO BE ADMINISTERED,  
IT MAKES HIM DROOL  
AND VOMIT A LOT.  
I HAVE TO MAKE  
SURE TO REMOVE  
IT FREQUENTLY.



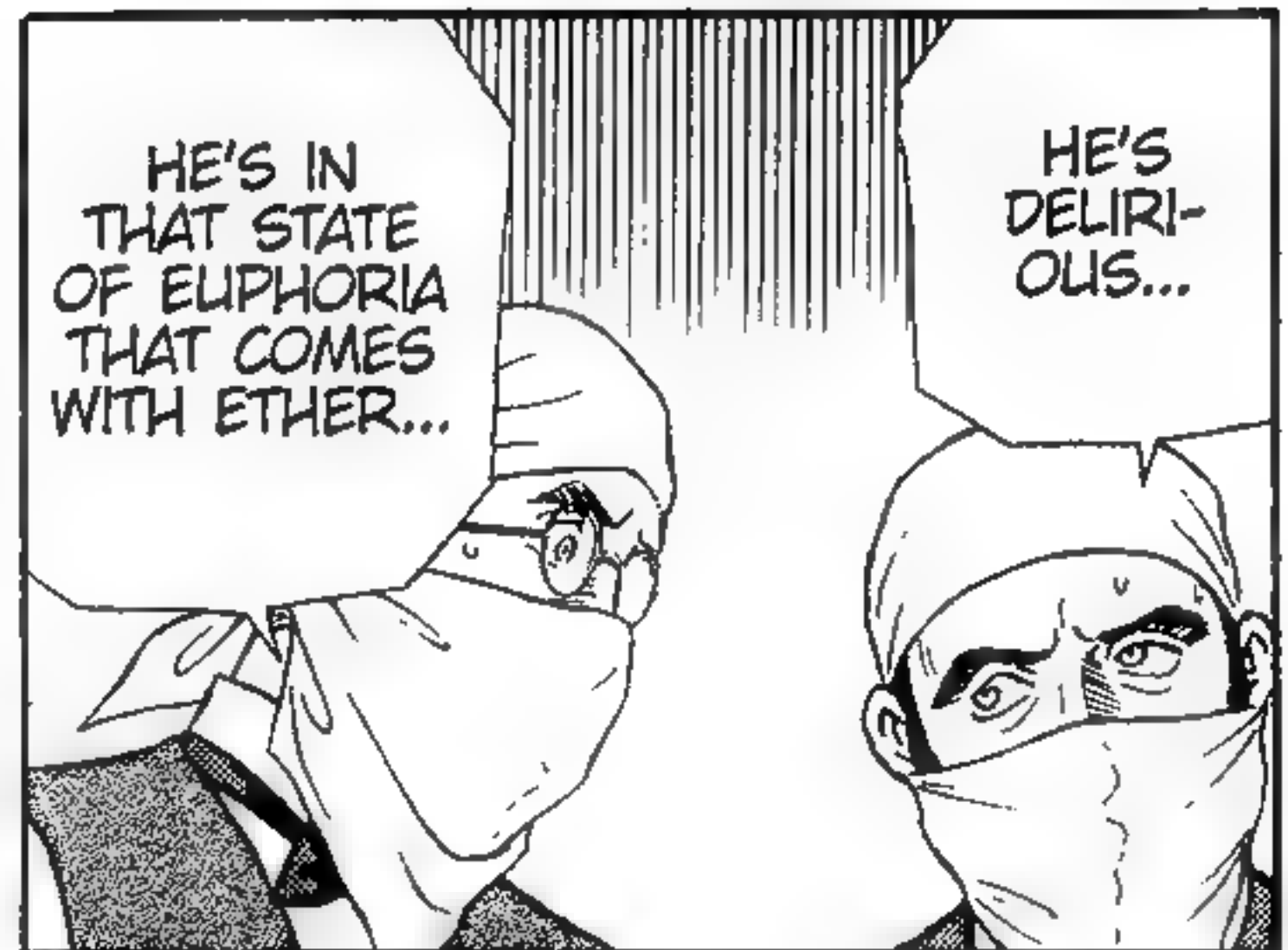
OH...!!  
I MISSED YOU  
SO MUCH,  
JULIA!

JU...LIA...!



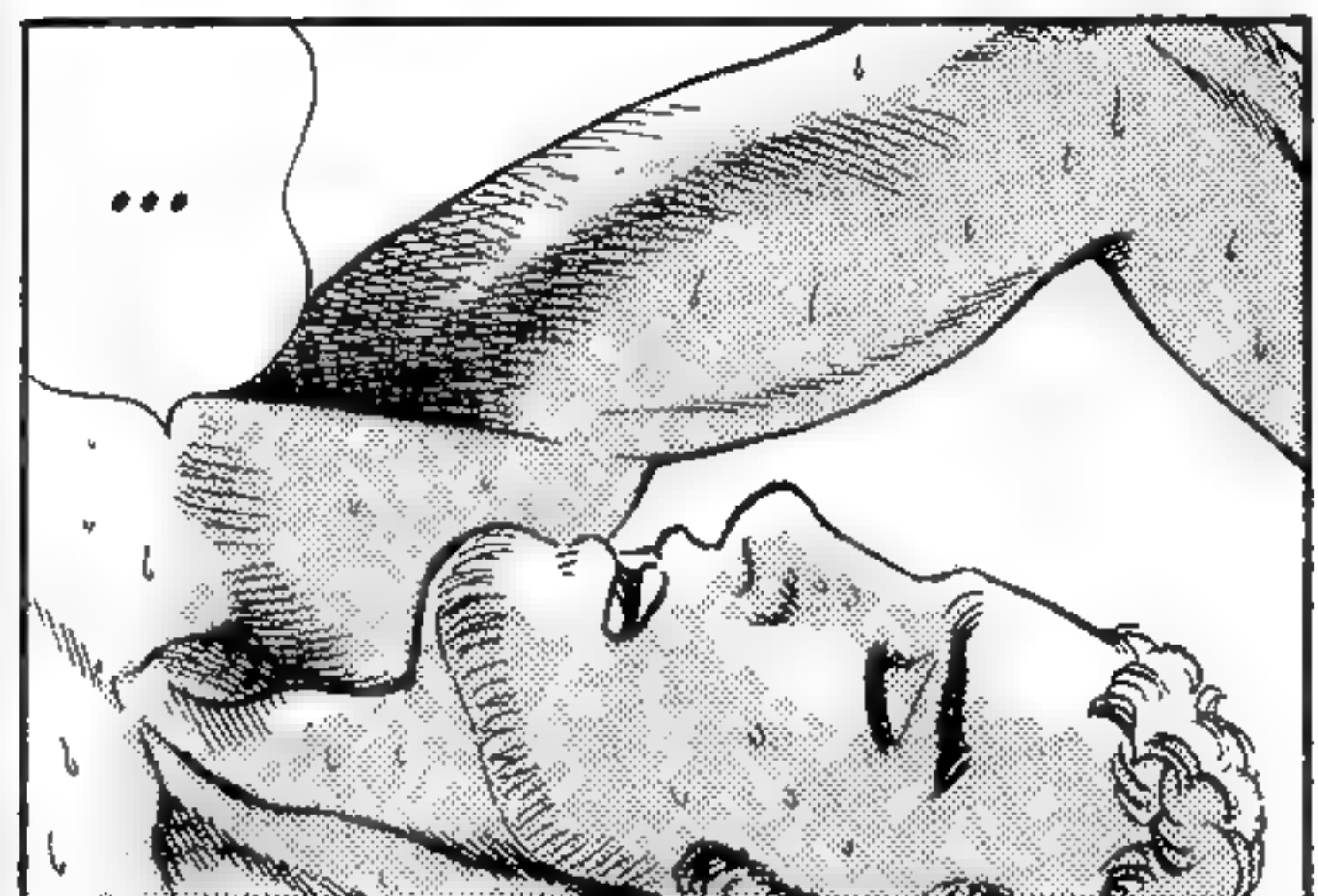
DISINFECT  
THE WOUND,  
AND START  
THE OPER-  
ATION.

I'VE FINISHED  
ADMINISTERING  
ANESTHESIA.  
NEXT WE MUST  
MAINTAIN THE  
ANESTHETIC  
DEPTH...

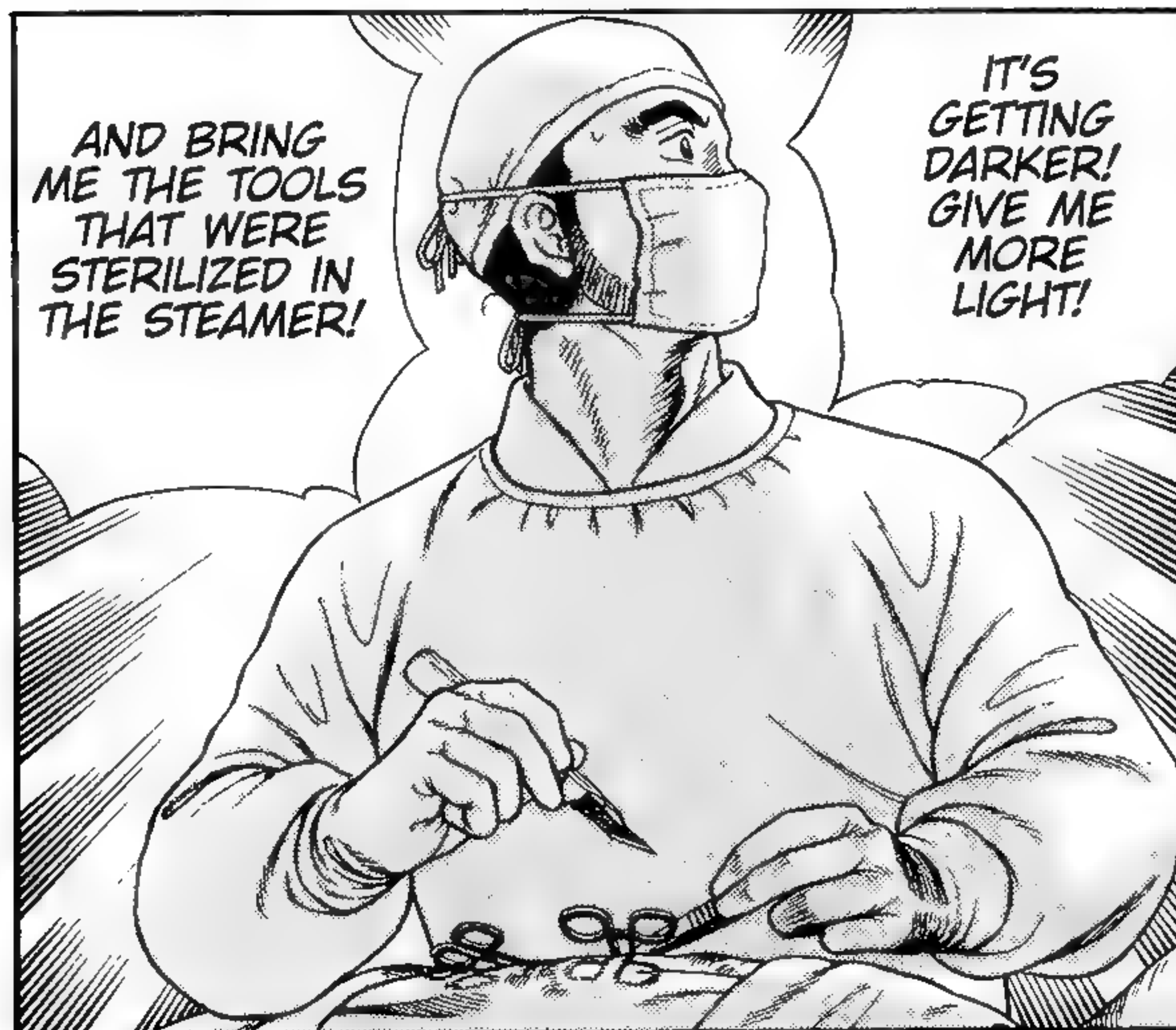
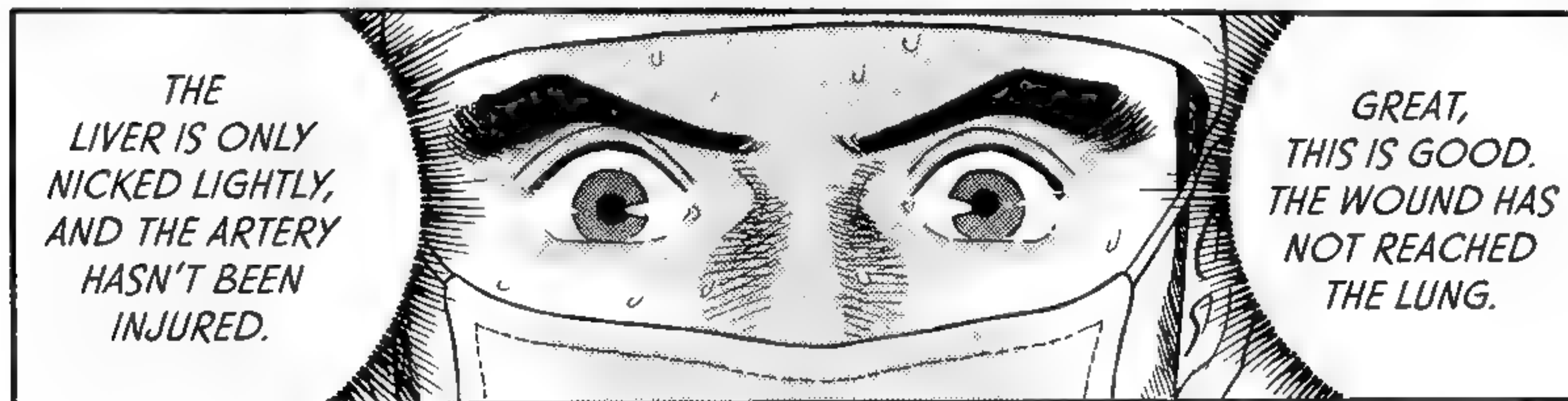
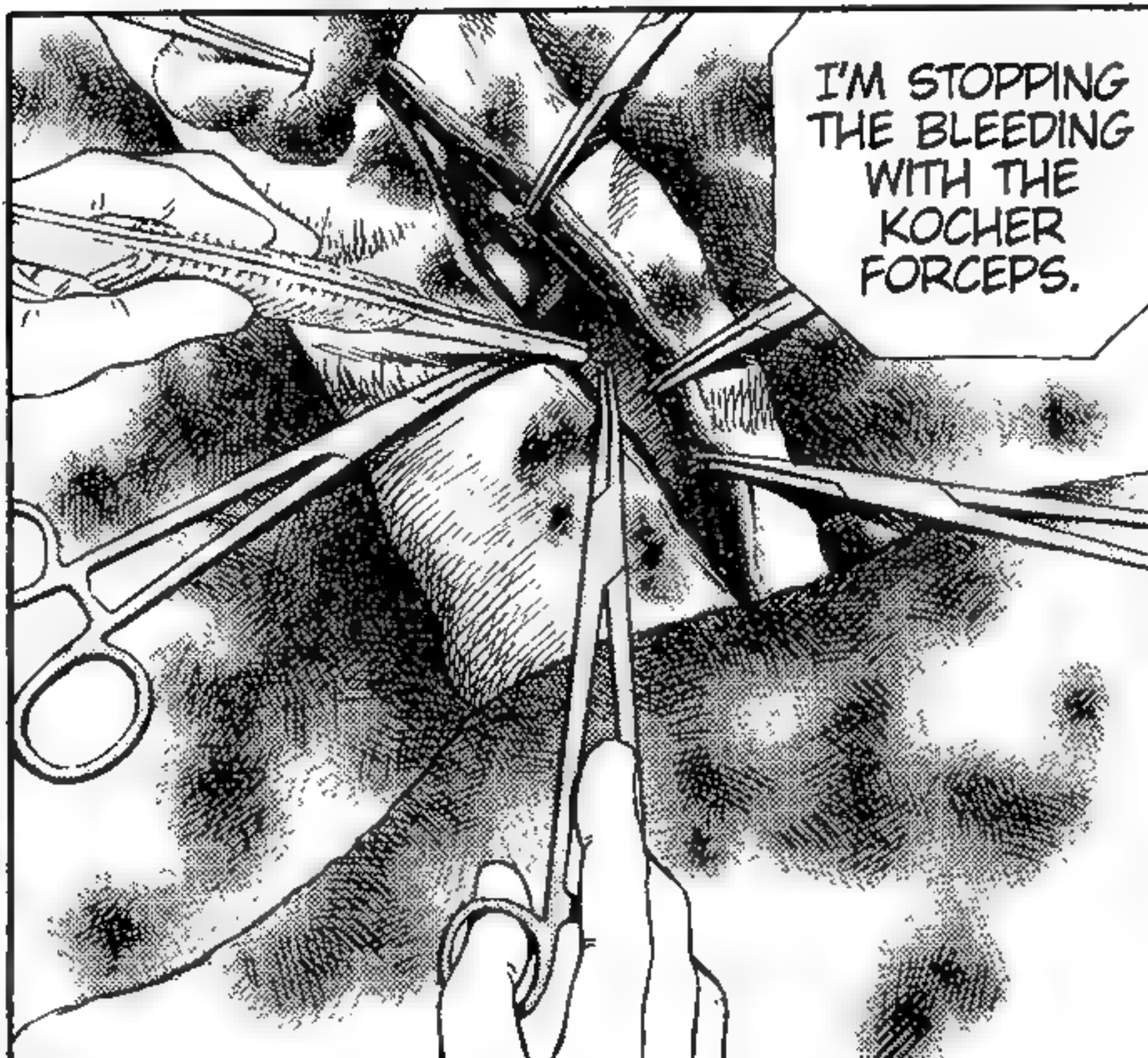
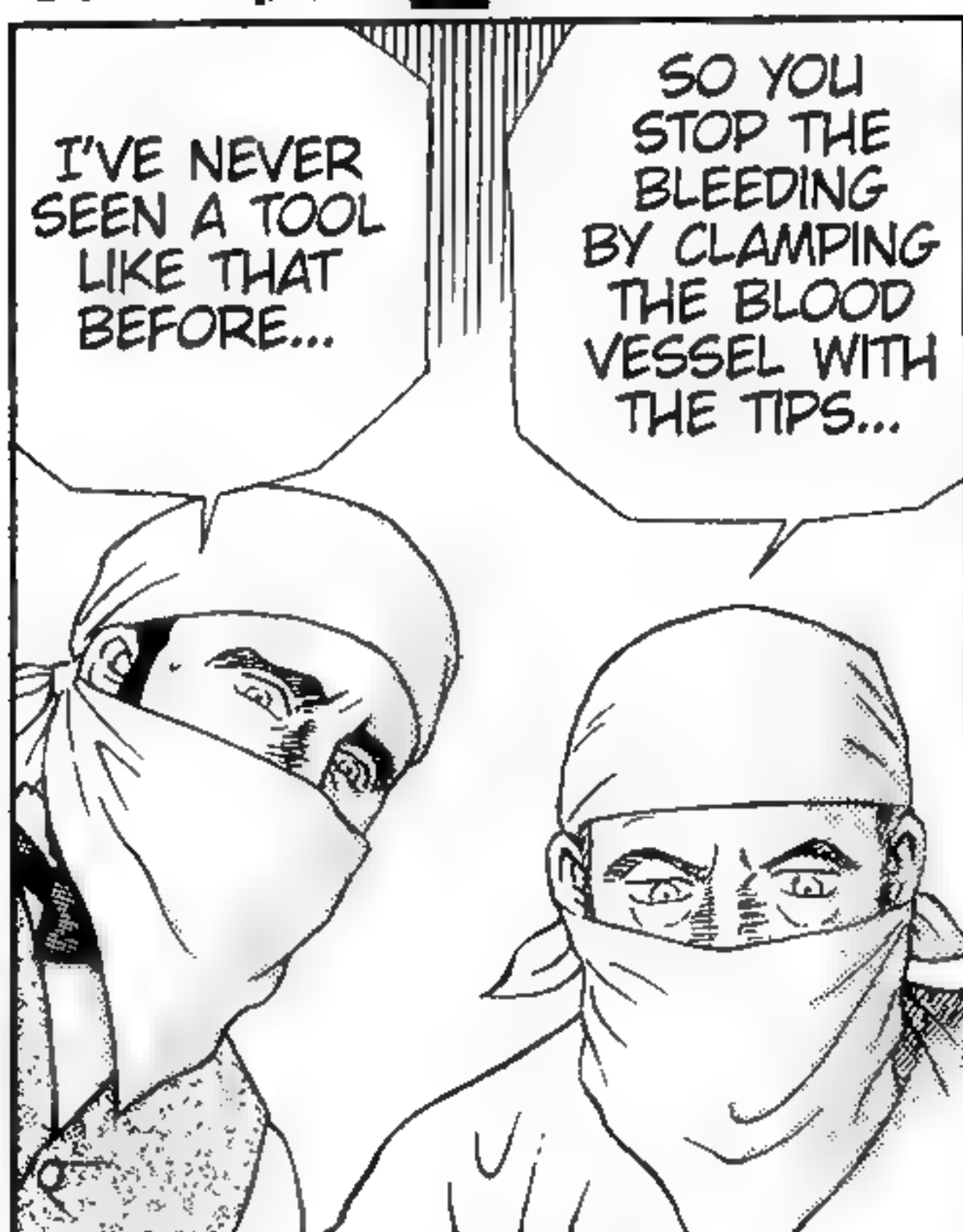


HE'S IN  
THAT STATE  
OF EUPHORIA  
THAT COMES  
WITH ETHER...

HE'S  
DELIRI-  
OUS...



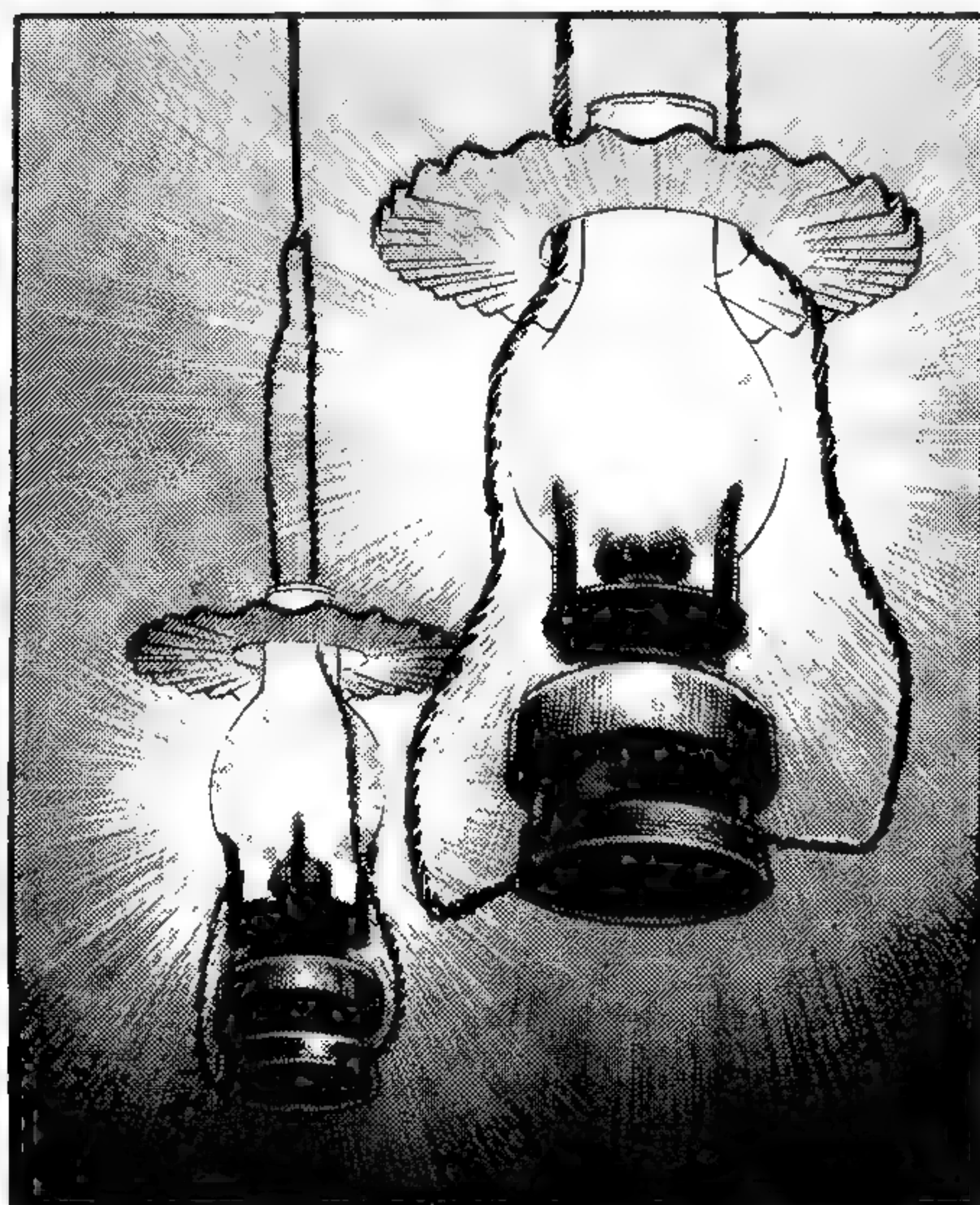
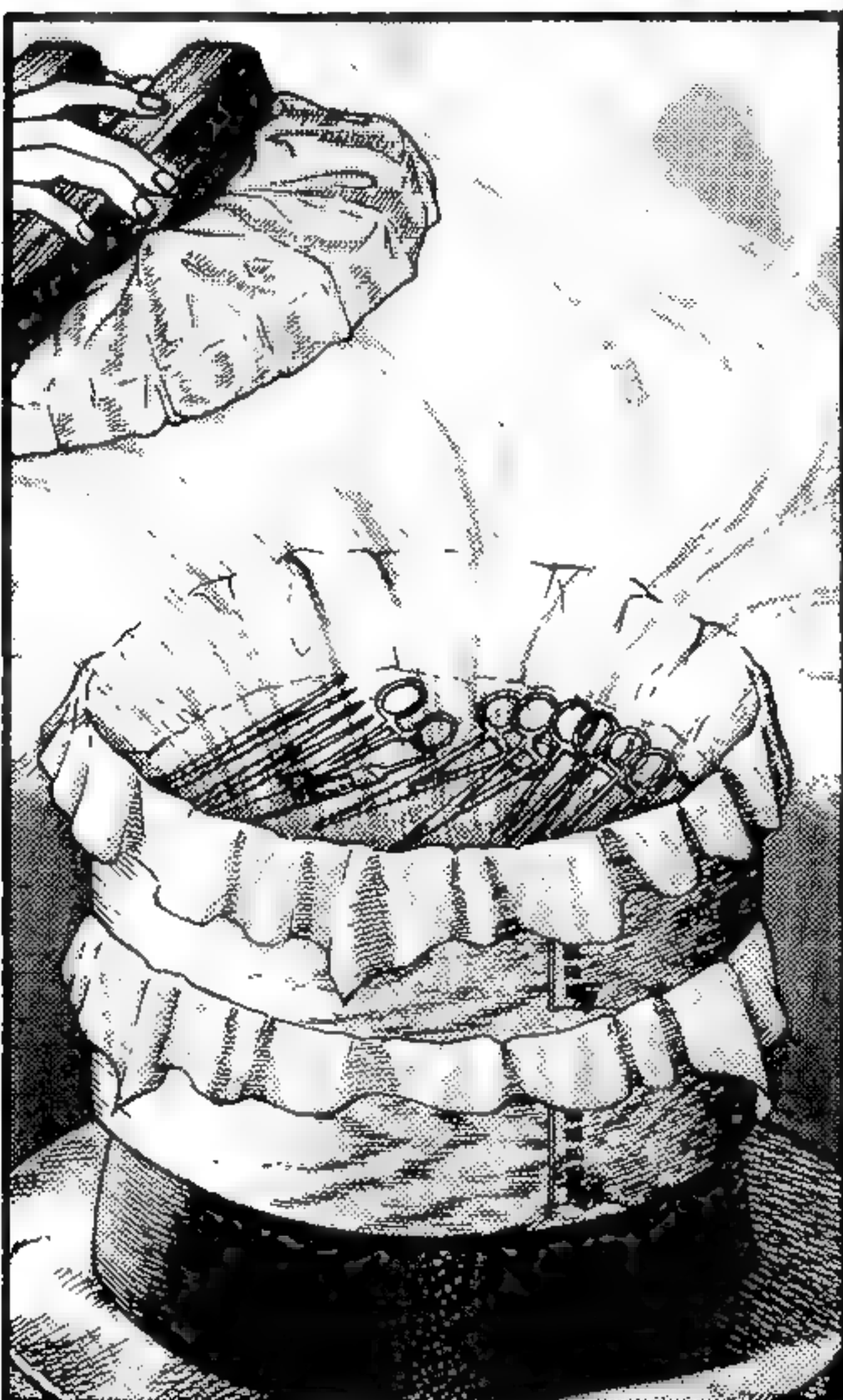
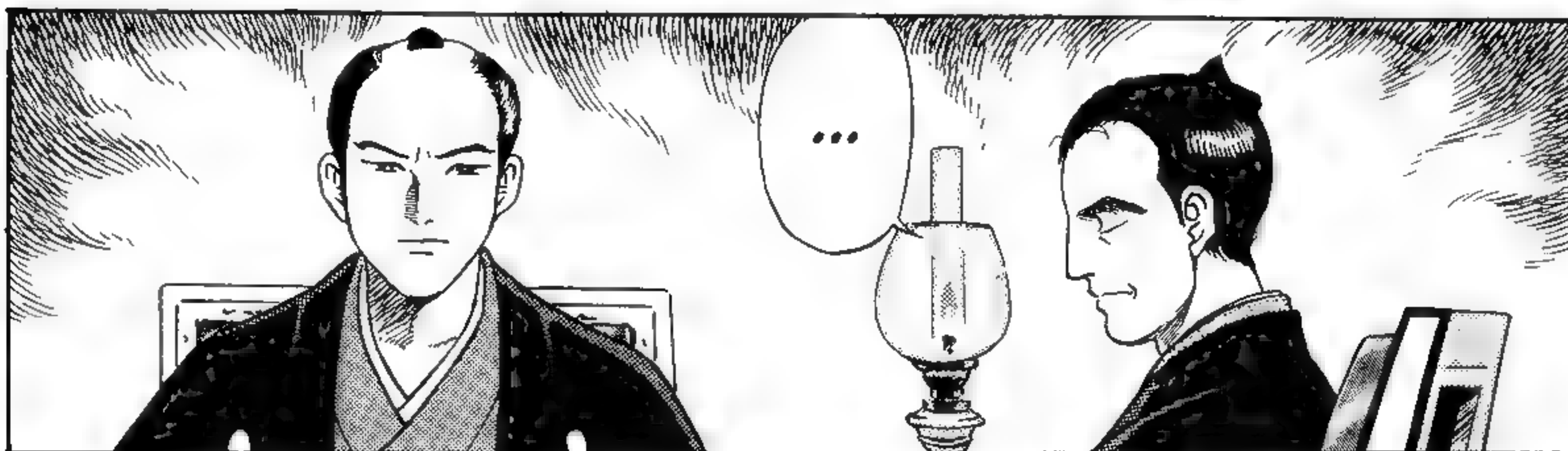




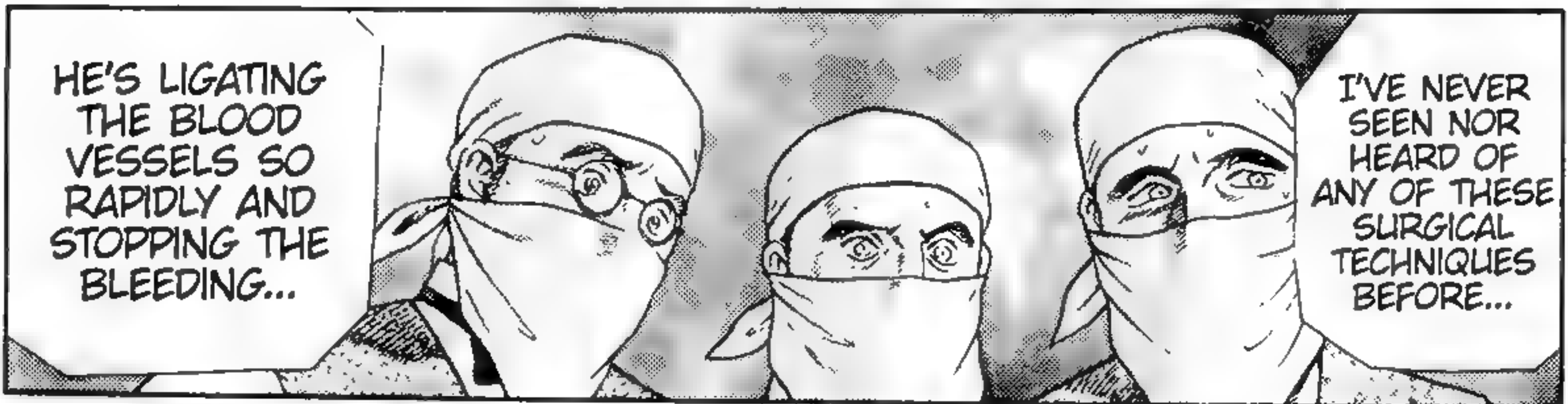
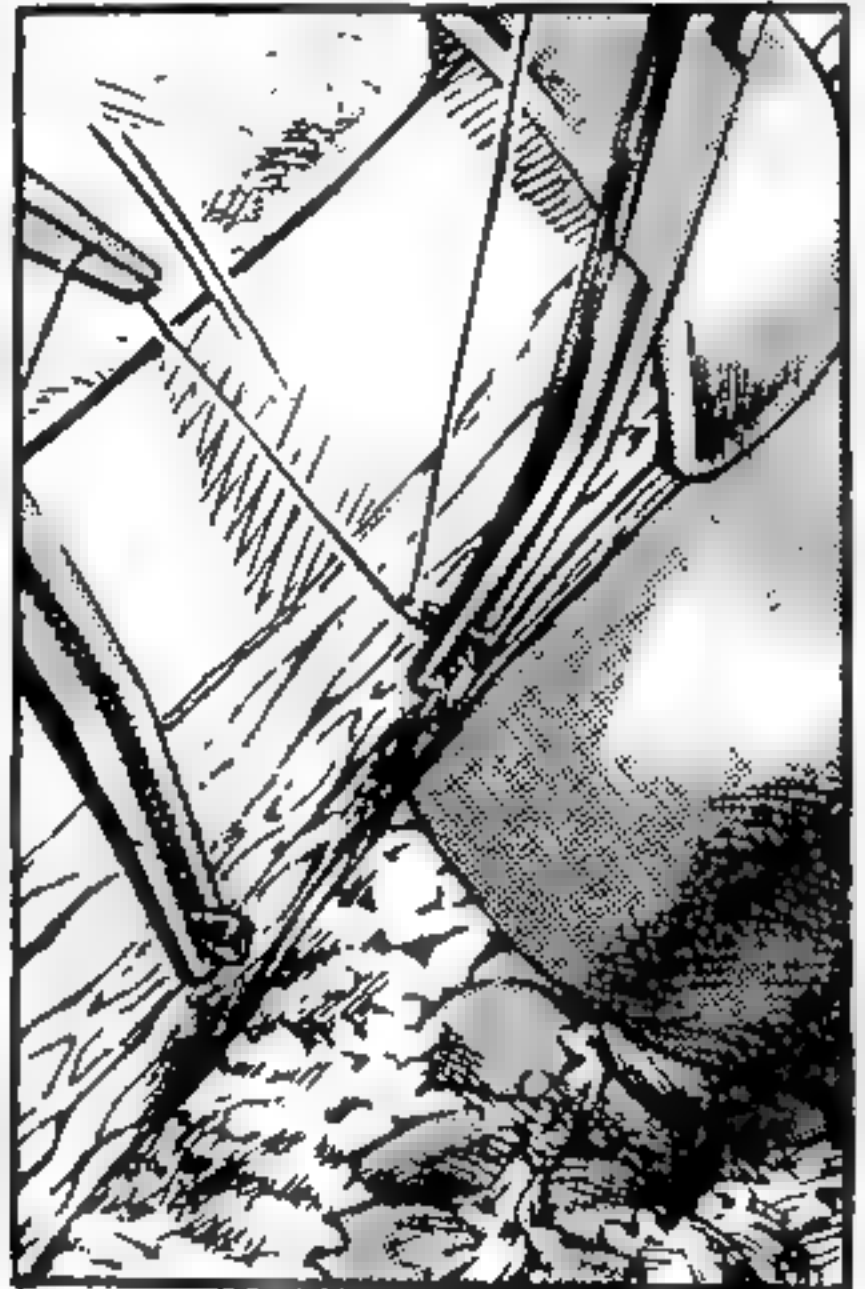
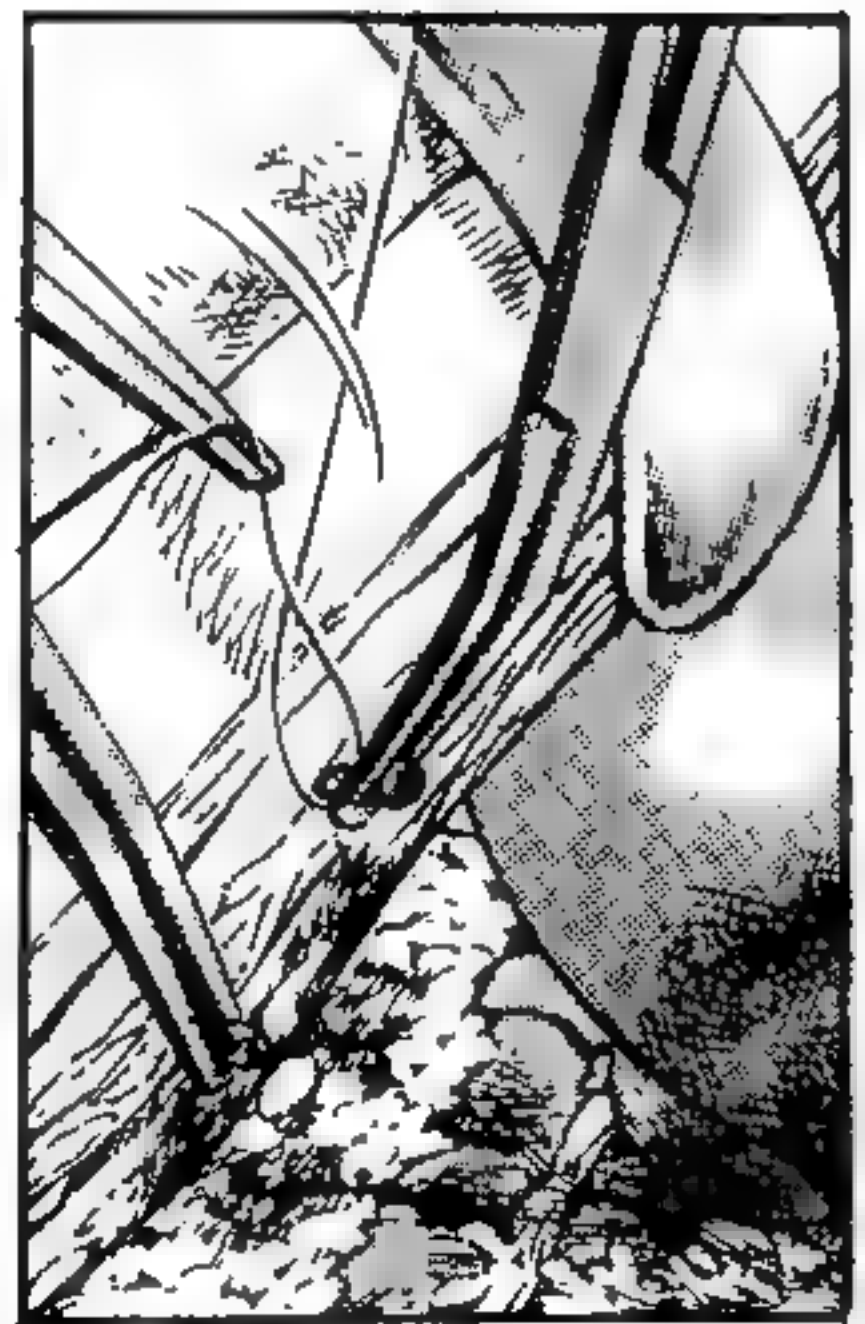






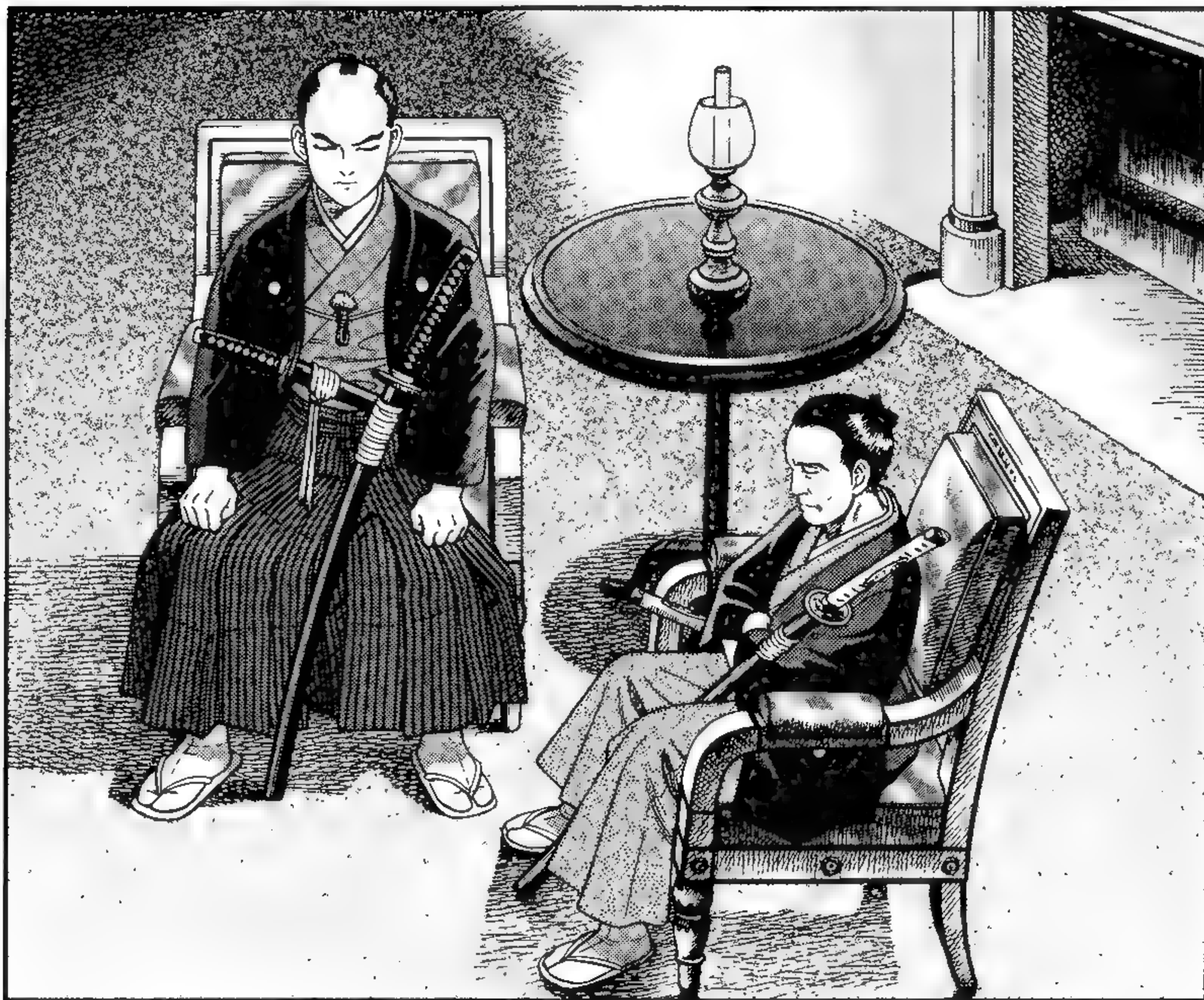








## HUMAN CHAPTER PART 2: WITNESSES OF THE MIRACLE



BUT I IMAGINE  
FOR MINAKATA-DONO,  
WHO'S OPERATING AT  
THIS VERY MOMENT,  
IT MAY FEEL LIKE IT'S  
PASSING FASTER.

IT DOES,  
KATSU-  
SENSEI...

DOESN'T IT  
FEEL LIKE TIME  
IS PASSING  
SLOWER THAN  
USUAL...?

KYO-  
TARO...

YES...  
THAT MAY  
BE SO...



# HUMAN CHAPTER PART 2: WITNESSES OF THE MIRACLE





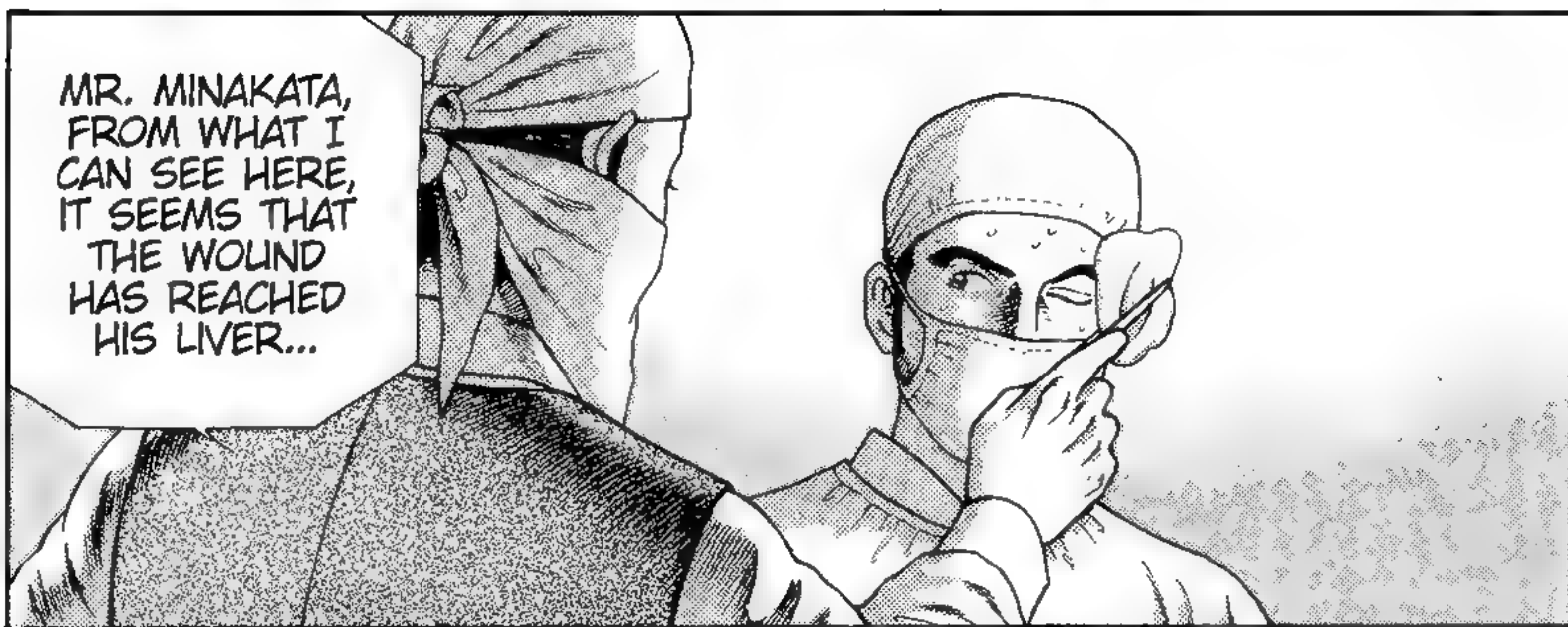


OKAY!



COULD YOU  
WIPE THE  
SWEAT AWAY  
FROM MY  
FOREHEAD  
WITH GAUZE  
USING THE  
TWEEZERS?

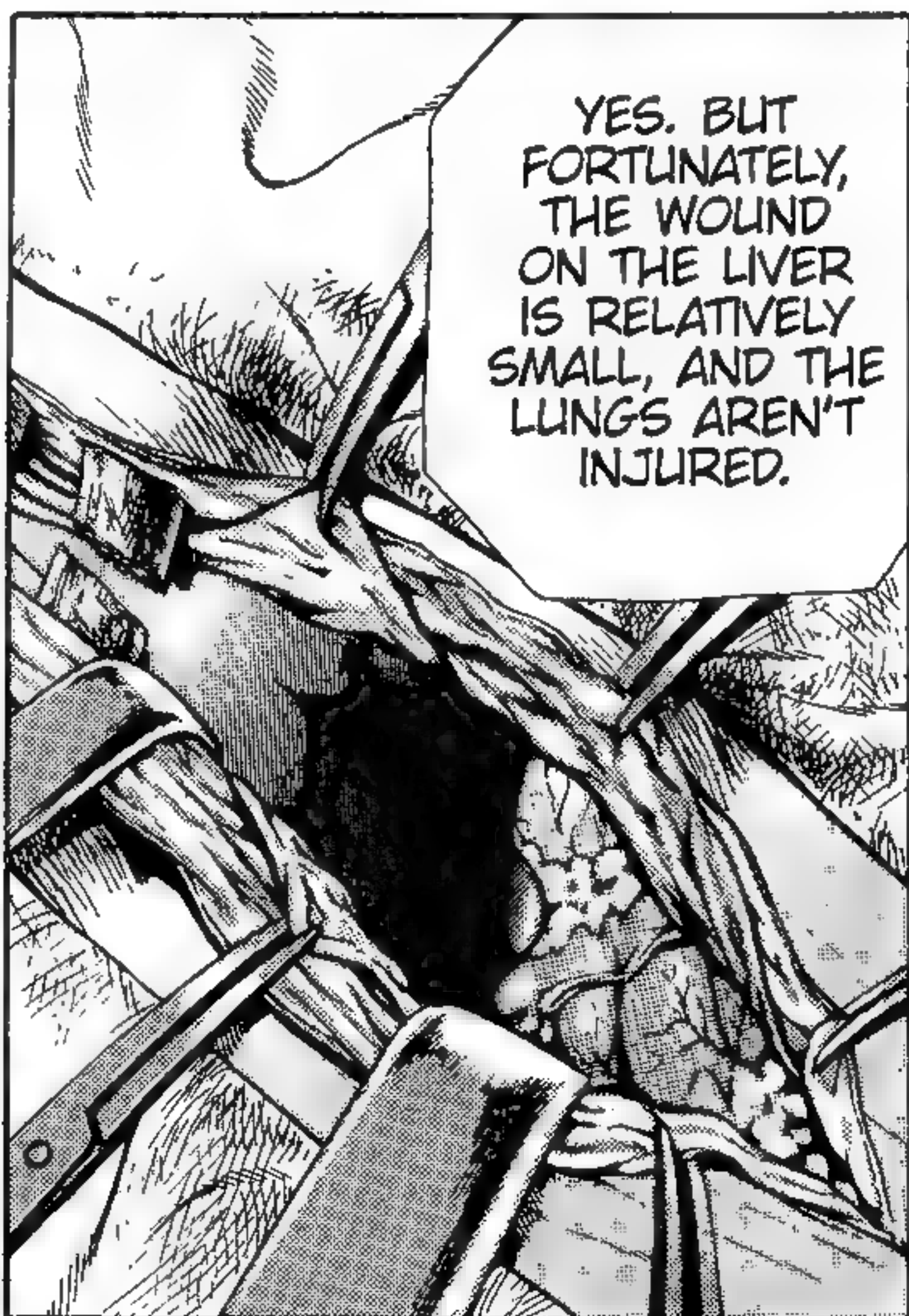
DR. WILLIS,



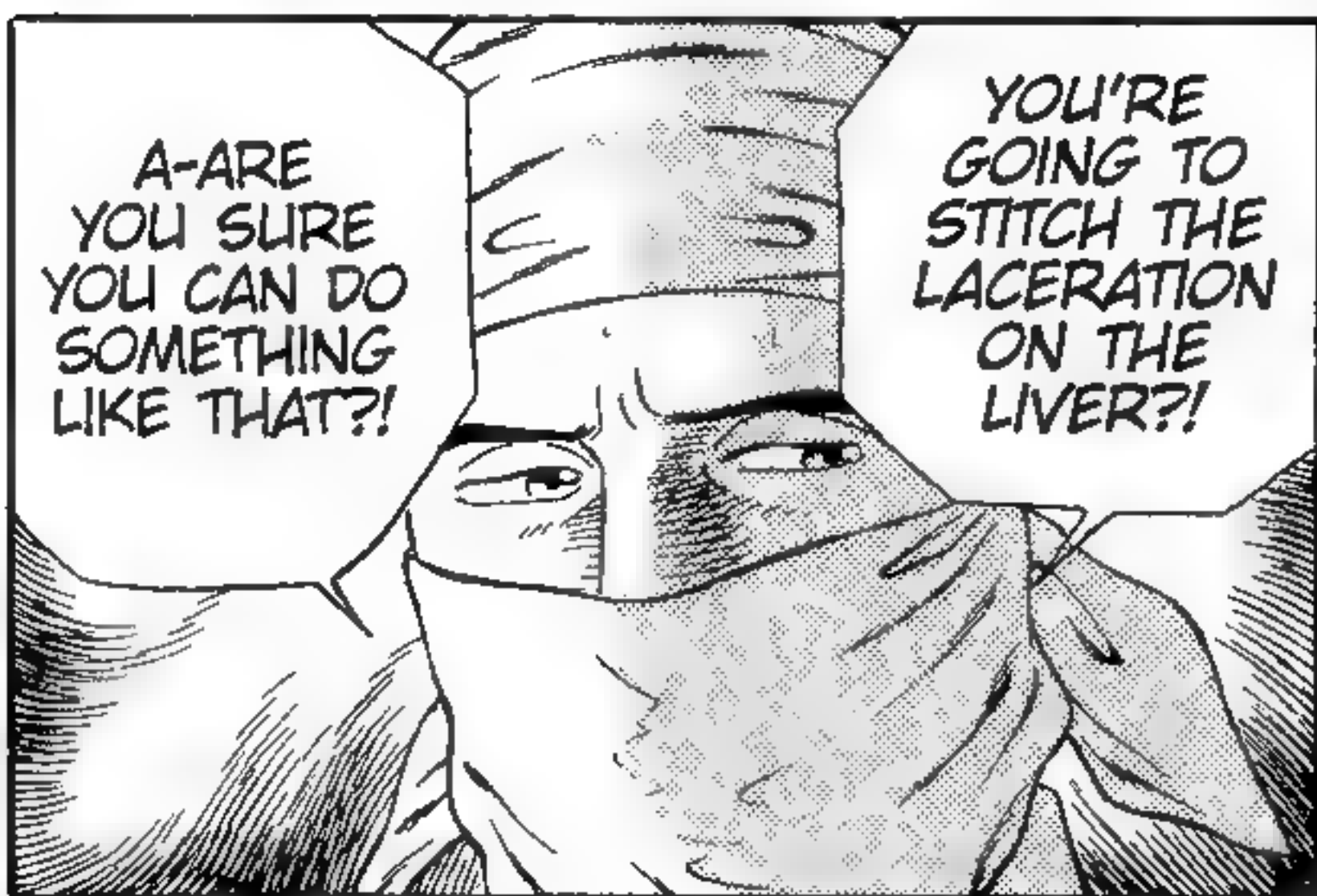
MR. MINAKATA,  
FROM WHAT I  
CAN SEE HERE,  
IT SEEMS THAT  
THE WOUND  
HAS REACHED  
HIS LIVER...



I'M GOING  
TO STITCH THE  
DAMAGED LIVER  
AND THE DIA-  
PHRAGM.



YES. BUT  
FORTUNATELY,  
THE WOUND  
ON THE LIVER  
IS RELATIVELY  
SMALL, AND THE  
LUNGS AREN'T  
INJURED.



A-ARE  
YOU SURE  
YOU CAN DO  
SOMETHING  
LIKE THAT?!

YOU'RE  
GOING TO  
STITCH THE  
LACERATION  
ON THE  
LIVER?!



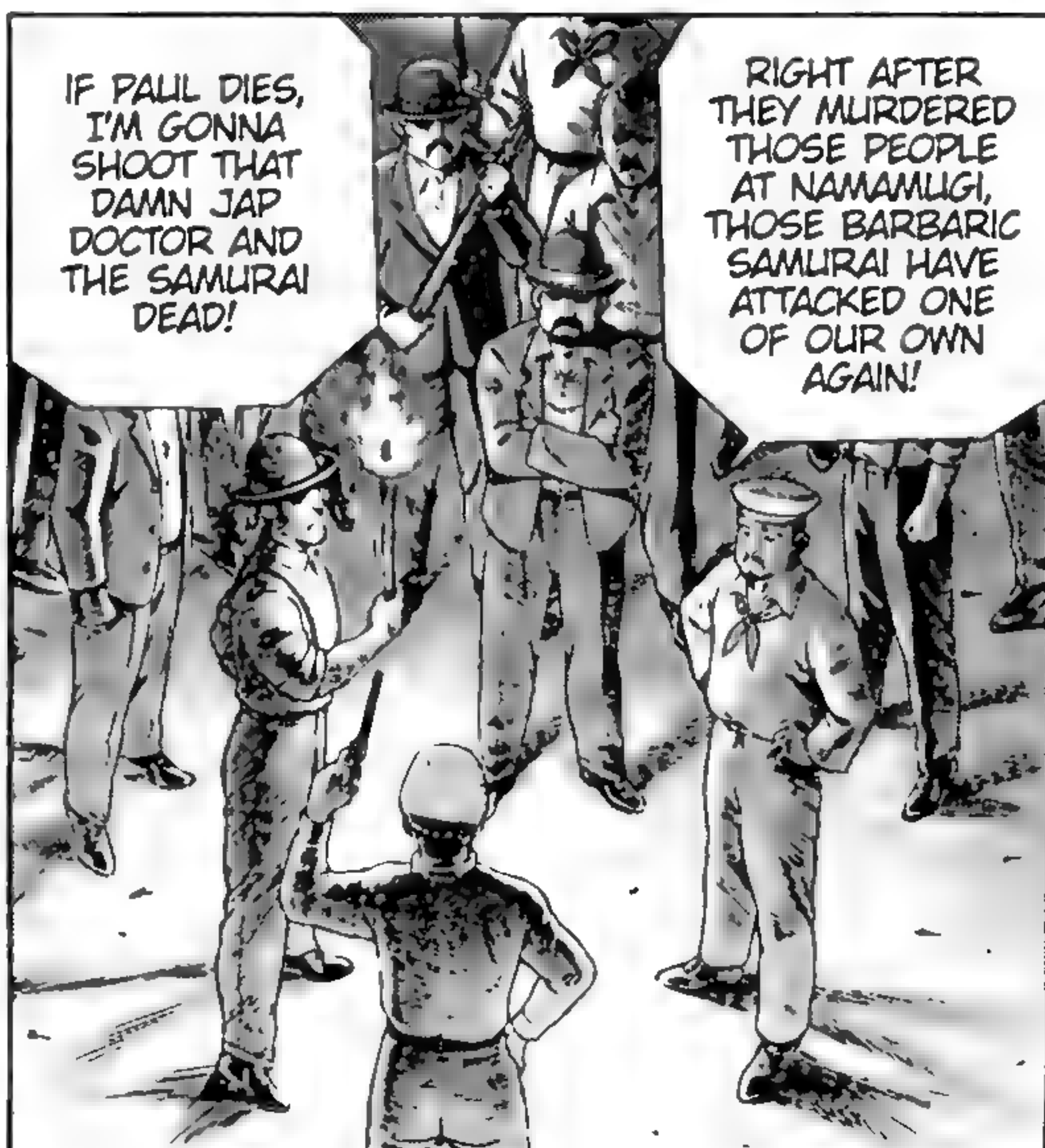


YOKO-  
HAMA, THE  
RED-LIGHT  
DISTRICT

横濱  
の  
紅  
燈  
区



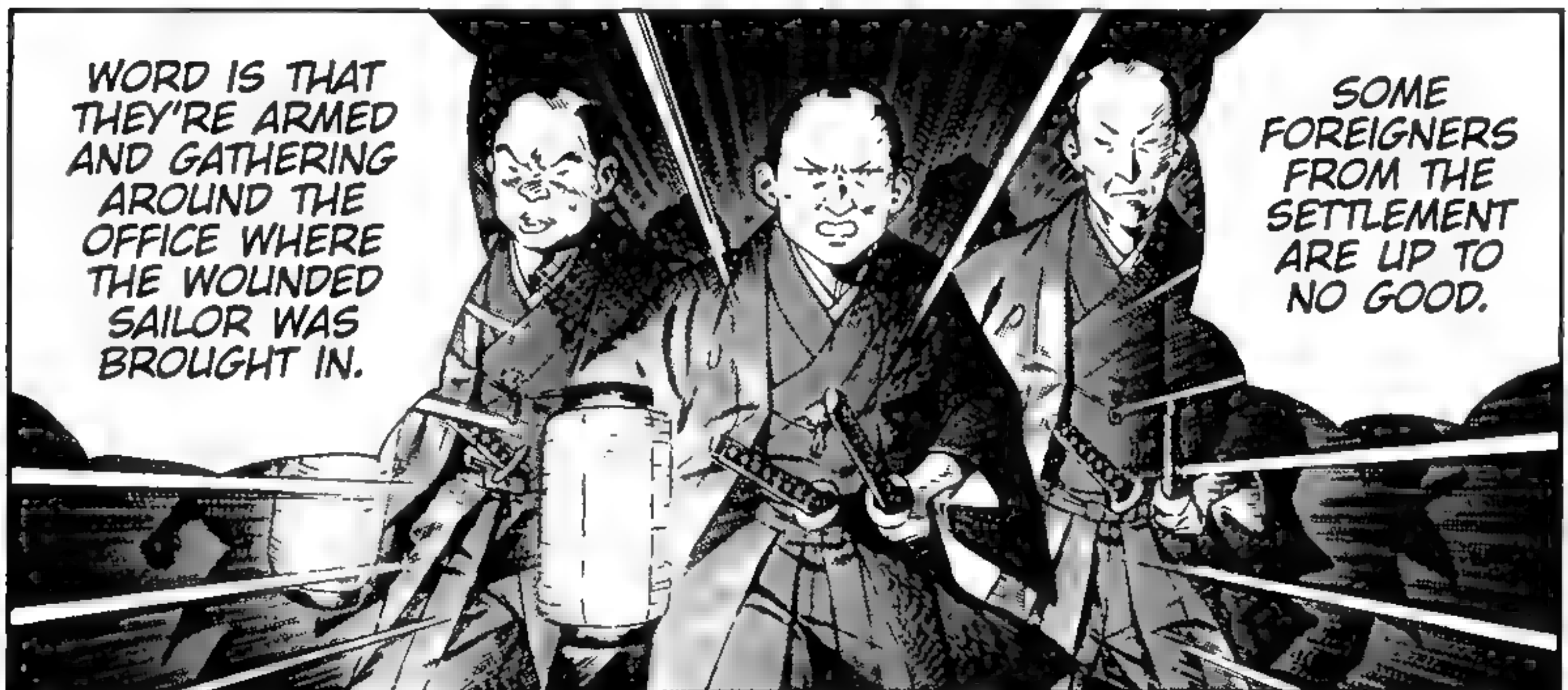
LET'S SHOW  
THOSE DAMN  
SAVAGES  
WHAT THEY'LL  
GET WHEN  
THEY MESS  
WITH US!



IF PAUL DIES,  
I'M GONNA  
SHOOT THAT  
DAMN JAP  
DOCTOR AND  
THE SAMURAI  
DEAD!

RIGHT AFTER  
THEY MURDERED  
THOSE PEOPLE  
AT NAMAMUGI,  
THOSE BARBARIC  
SAMURAI HAVE  
ATTACKED ONE  
OF OUR OWN  
AGAIN!





WORD IS THAT  
THEY'RE ARMED  
AND GATHERING  
AROUND THE  
OFFICE WHERE  
THE WOUNDED  
SAILOR WAS  
BROUGHT IN.

SOME  
FOREIGNERS  
FROM THE  
SETTLEMENT  
ARE UP TO  
NO GOOD.



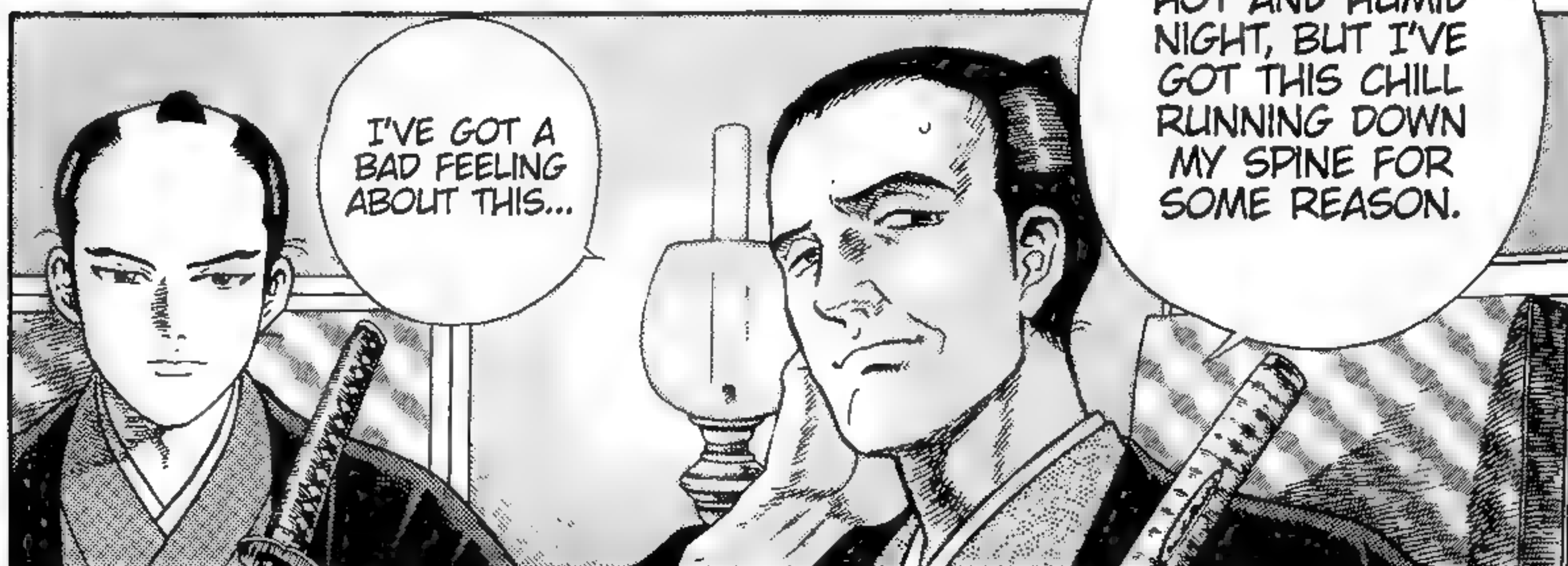
WE MUST  
SECURE HIS  
SAFETY!

RINTARO KATSU,  
THE HEADMASTER OF  
THE NAVAL ARTILLERY  
ACADEMY, IS IN THE  
MEDICAL OFFICE!





IT'S SUCH A  
HOT AND HUMID  
NIGHT, BUT I'VE  
GOT THIS CHILL  
RUNNING DOWN  
MY SPINE FOR  
SOME REASON.



I'VE GOT A  
BAD FEELING  
ABOUT THIS...



THE SAILOR'S  
COMRADES ARE  
MOST LIKELY  
GATHERING  
TOGETHER.

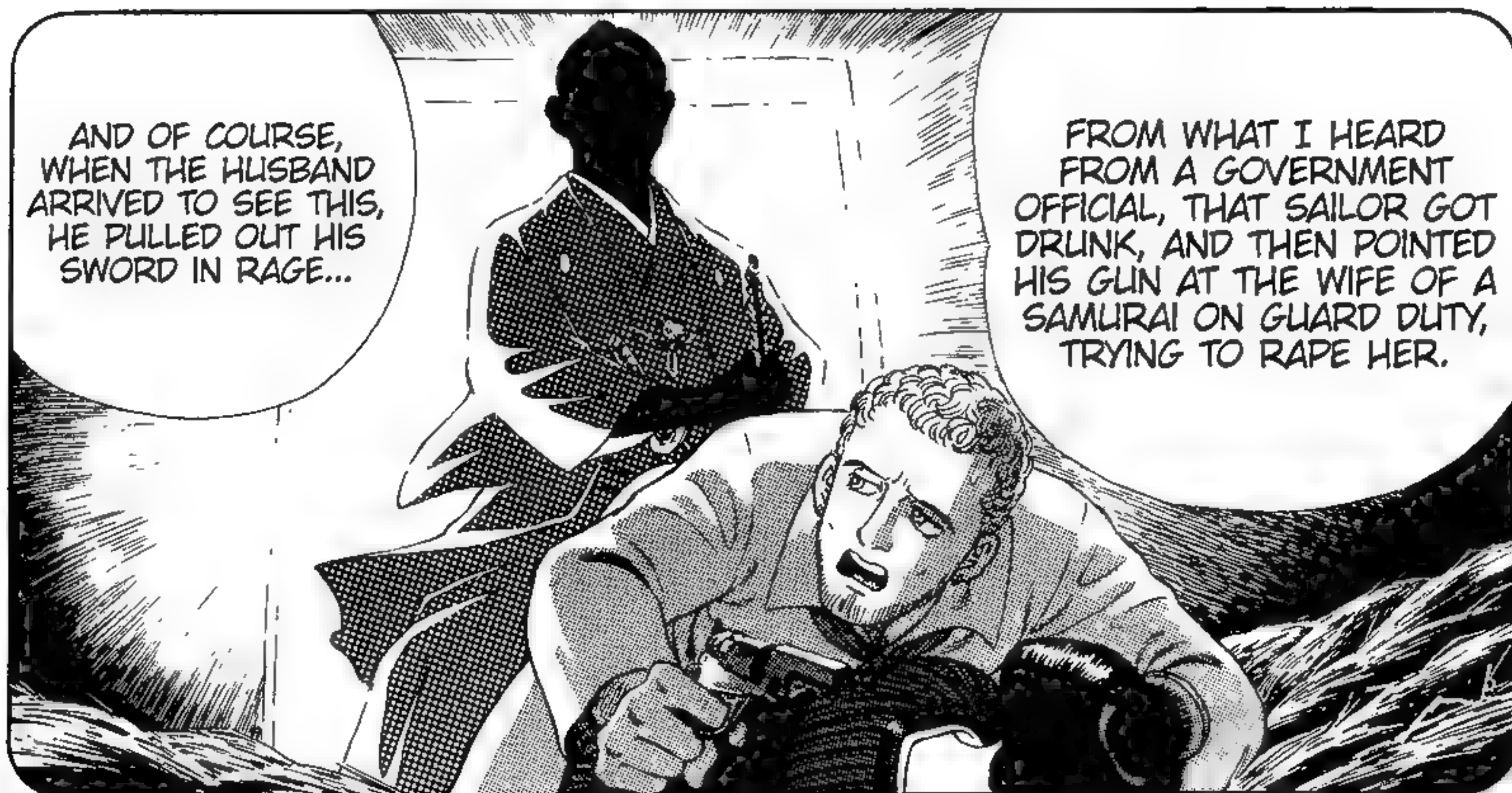
IT'S NOISIER  
OUTSIDE THAN  
BEFORE...



WE MIGHT  
GET KILLED AS  
REVENGE.

THOSE GUYS  
ARE FURIOUS...  
IF THE SAILOR  
ENDS UP DYING,





AND OF COURSE,  
WHEN THE HUSBAND  
ARRIVED TO SEE THIS,  
HE PULLED OUT HIS  
SWORD IN RAGE...

FROM WHAT I HEARD  
FROM A GOVERNMENT  
OFFICIAL, THAT SAILOR GOT  
DRUNK, AND THEN POINTED  
HIS GUN AT THE WIFE OF A  
SAMURAI ON GUARD DUTY,  
TRYING TO RAPE HER.



IT'S THE  
SAILOR  
WHO'S AT  
FAULT IN  
THE FIRST  
PLACE...

YES...  
EXACTLY.



IF THAT  
HAPPENED  
TO ME,  
I'M SURE  
I'D HAVE  
CLUT THE  
BASTARD  
DOWN!

SUCH A  
COWARDLY  
ACT! DAMN  
HOOLIGAN!



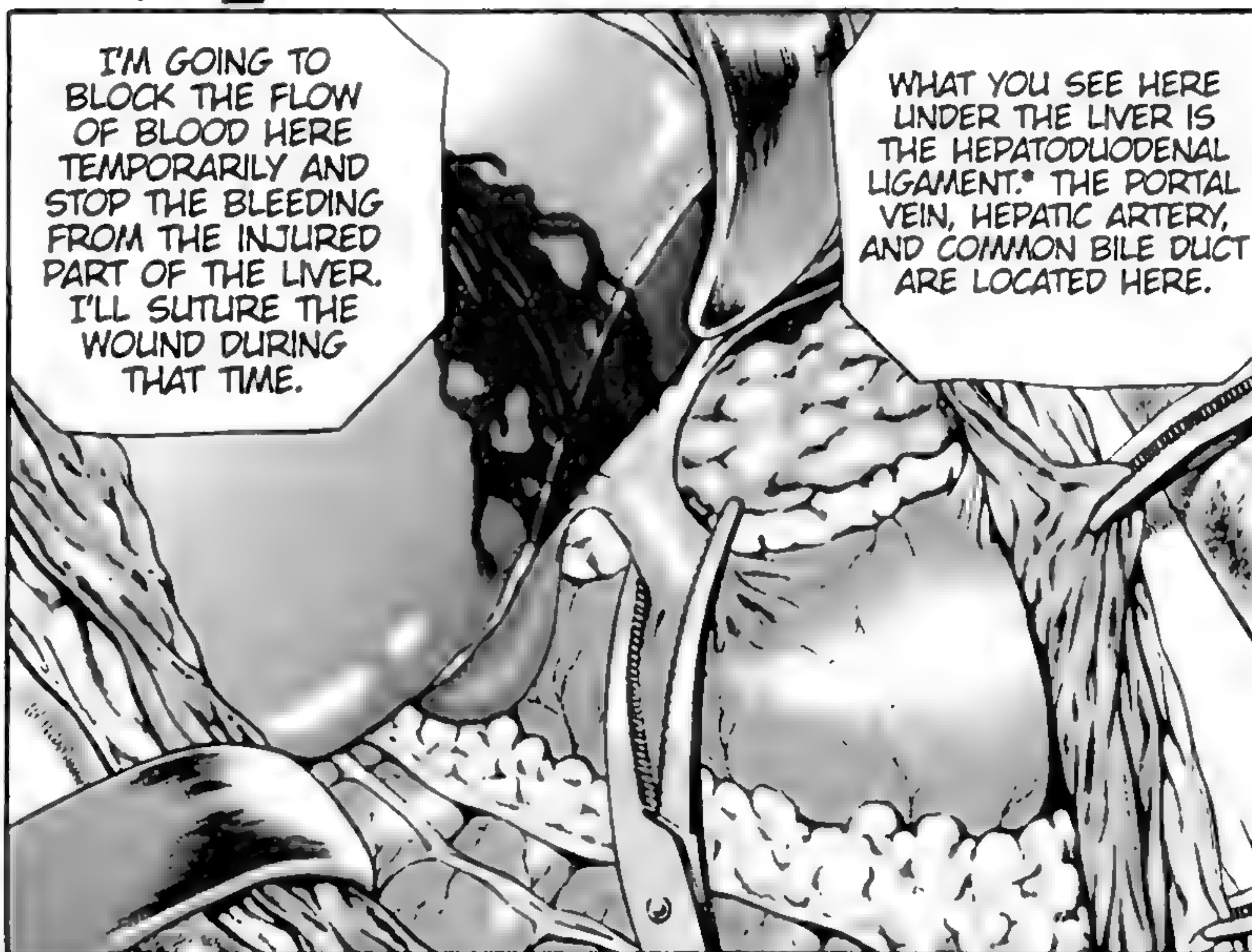
OF COURSE,  
THE SAILOR  
MUST BE  
SAVED FIRST  
FOR THAT TO  
HAPPEN...



IN OTHER WORDS,  
WE MAY BE ABLE TO  
SETTLE EVERYTHING  
AMICABLY AS LONG  
AS WE NEGOTIATE  
IT PROPERLY.

UNLIKE  
THE INCIDENT  
AT NAMAMUGI,  
THIS IS SHAMEFUL  
FOR THEM. I'M  
SURE THEY WON'T  
WANT TO MAKE  
IT OFFICIAL.





I'M GOING TO  
BLOCK THE FLOW  
OF BLOOD HERE  
TEMPORARILY AND  
STOP THE BLEEDING  
FROM THE INJURED  
PART OF THE LIVER.  
I'LL SUTURE THE  
WOUND DURING  
THAT TIME.

WHAT YOU SEE HERE  
UNDER THE LIVER IS  
THE HEPATODUODENAL  
LIGAMENT.\* THE PORTAL  
VEIN, HEPATIC ARTERY,  
AND COMMON BILE DUCT  
ARE LOCATED HERE.

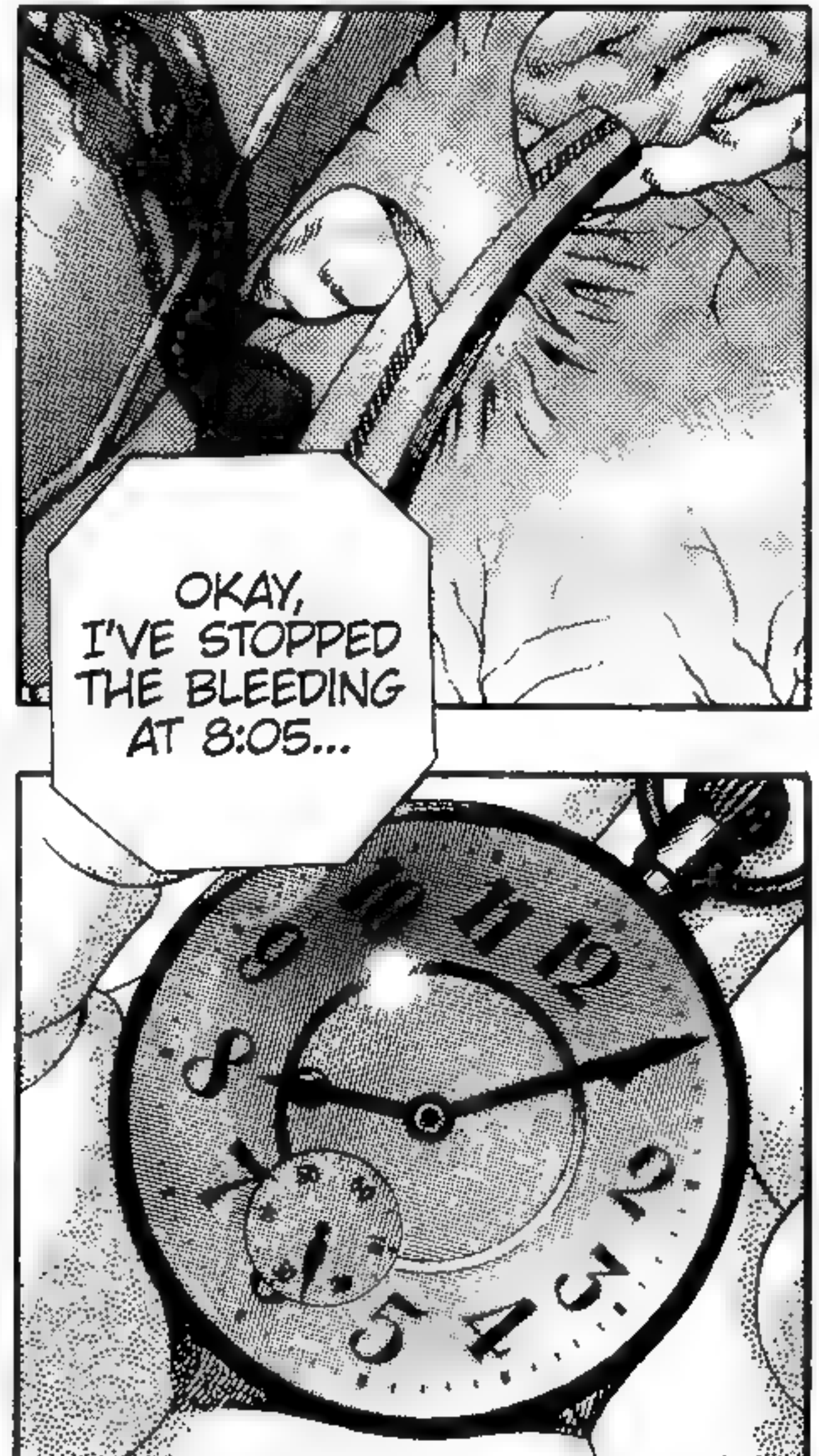
\*THE PORTION OF THE LESSER OMENTUM THAT EXTENDS BETWEEN THE LIVER AND THE DUODENUM.



I MUST  
COMPLETE  
THE SUTURE  
WITHIN THOSE  
15 MINUTES  
NO MATTER  
WHAT!

HOWEVER,  
UNDER THESE  
CONDITION, I  
CAN PROBABLY  
ONLY BLOCK  
THE BLOOD  
FLOW FOR...  
15 MINUTES  
MAXIMUM.

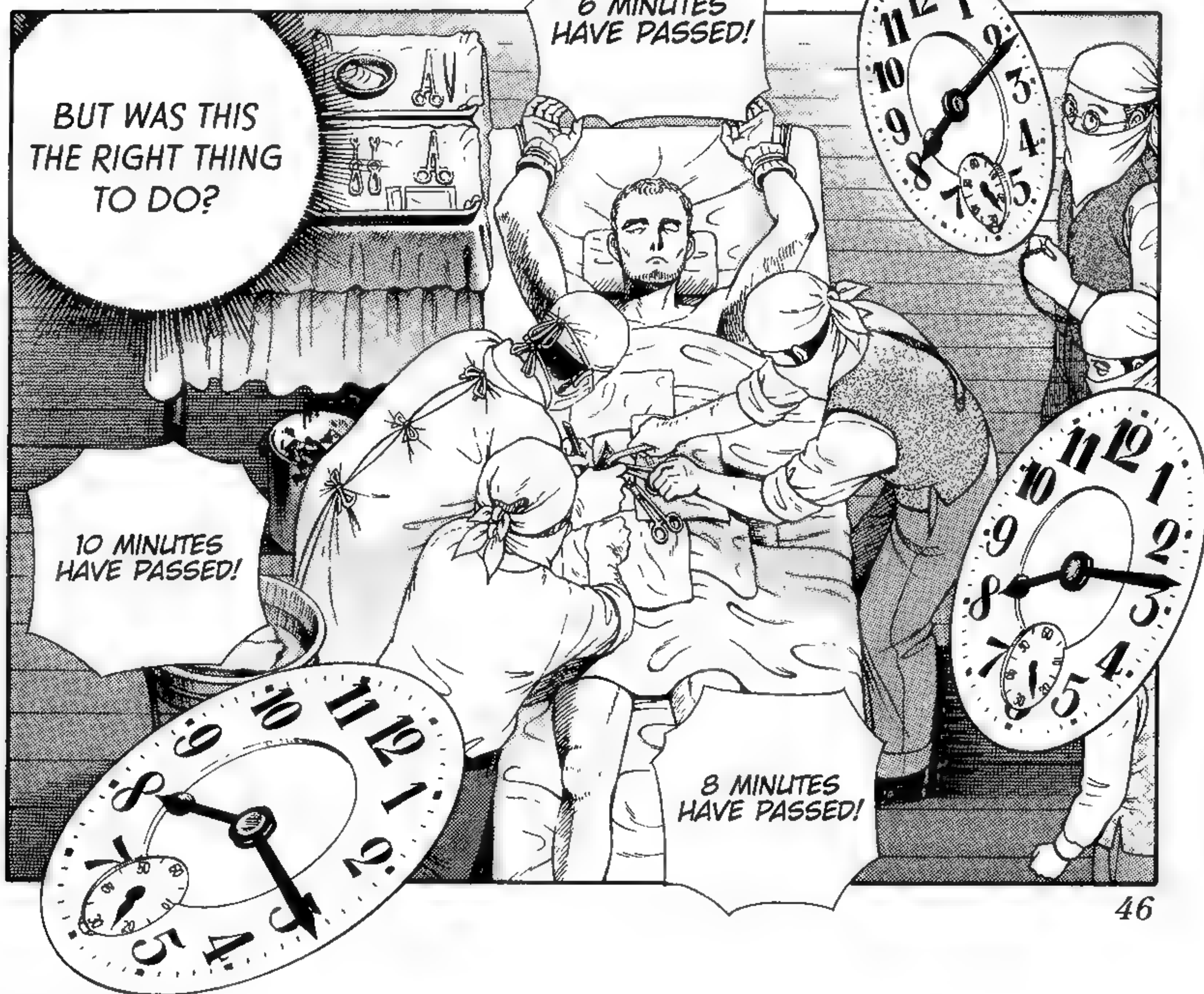
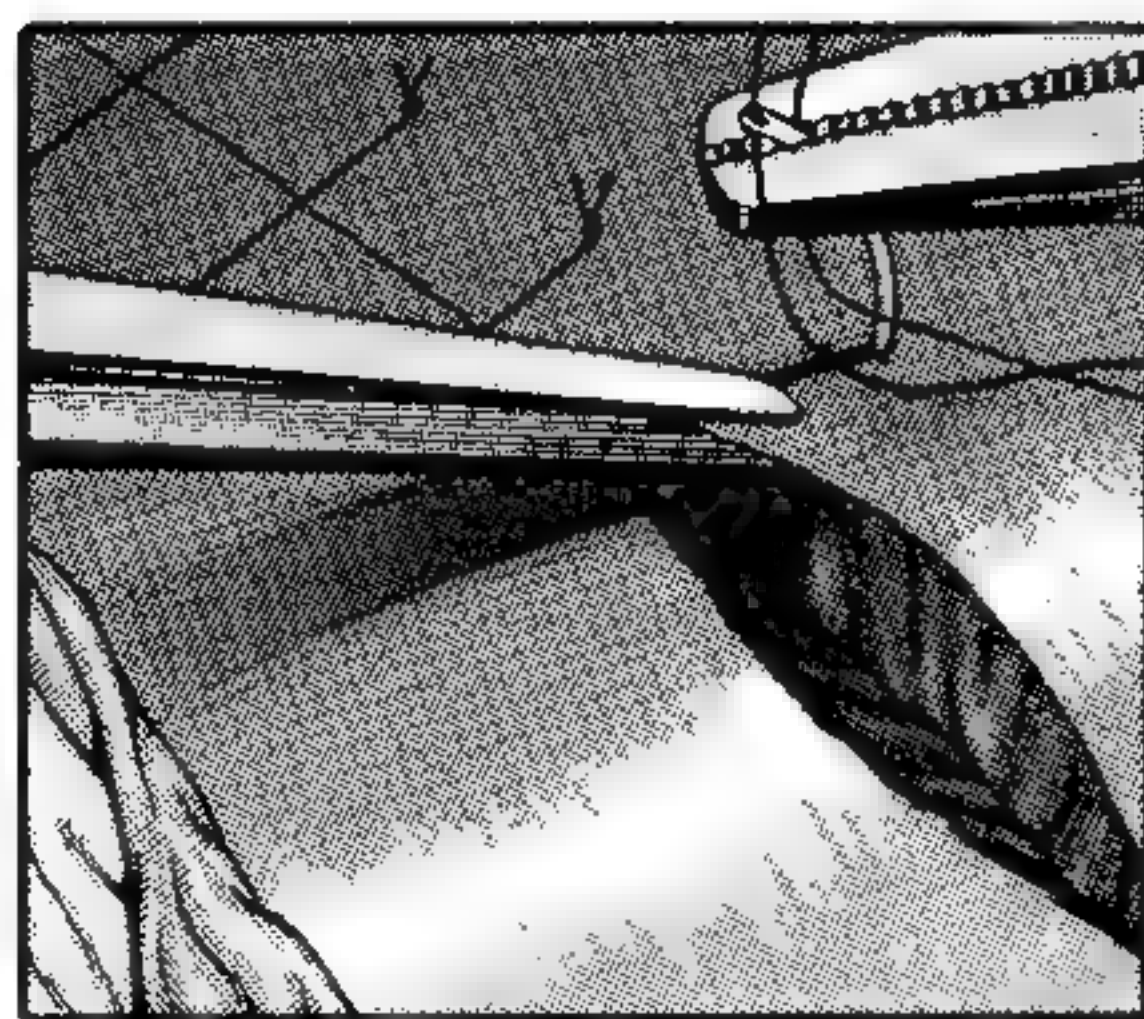














IT WILL  
DEFINITELY  
CHANGE  
HISTORY  
ITSELF...



SINCE I NUDGED  
THE NEEDLE ON  
THE CLOCK OF  
MEDICAL HISTORY  
FORWARD, PEOPLE  
THAT WOULD'VE  
DIED WILL LIVE,  
AND PEOPLE THAT  
WOULD'VE EXISTED  
MIGHT NEVER  
BE BORN.

DID I ERASE  
THE WORLD  
WHERE I CAME  
FROM ON MY  
OWN? OR DID  
I CREATE A  
COMPLETELY  
DIFFERENT  
ONE?

IF THAT'S  
THE CASE...  
THEN DID I  
REALLY EXIST  
IN THE ERA  
138 YEARS  
FROM NOW?





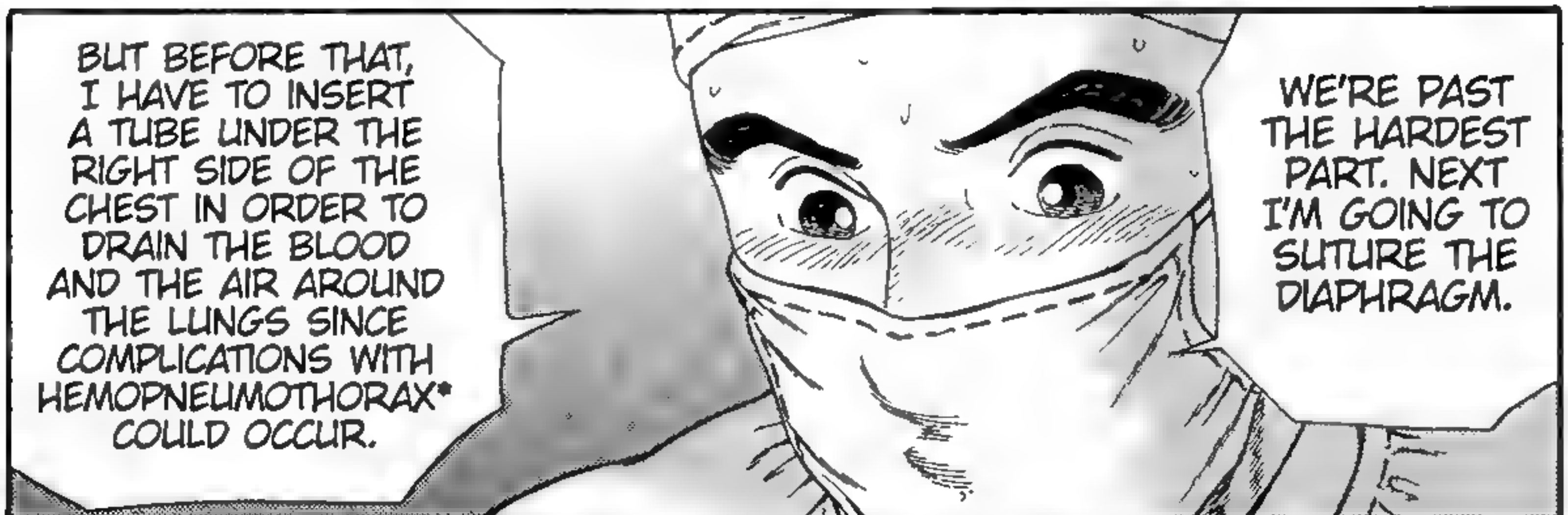


15 MINUTES  
EXACTLY!



I'M LETTING  
THE BLOOD  
FLOW AGAIN!

SUTURE  
COMPLETE!



BUT BEFORE THAT,  
I HAVE TO INSERT  
A TUBE UNDER THE  
RIGHT SIDE OF THE  
CHEST IN ORDER TO  
DRAIN THE BLOOD  
AND THE AIR AROUND  
THE LUNGS SINCE  
COMPLICATIONS WITH  
HEMOPNEUMOTHORAX\*  
COULD OCCUR.

WE'RE PAST  
THE HARDEST  
PART. NEXT  
I'M GOING TO  
SUTURE THE  
DIAPHRAGM.

\*WHEN THERE'S BLOOD OR AIR IN THE CHEST CAVITY.



CHATTER

CHATTER









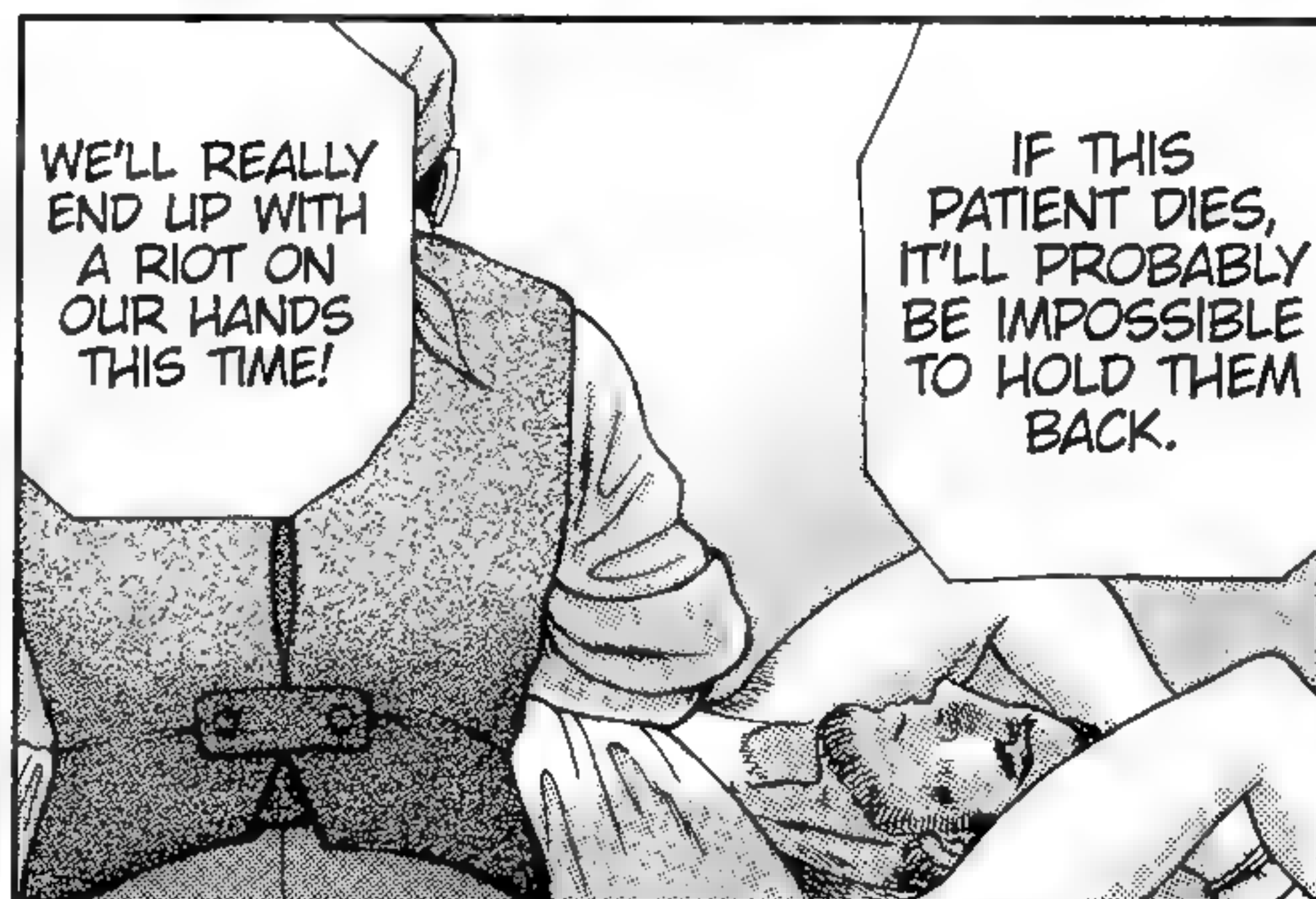
LAST TIME, WHEN THE NAMAMUGI INCIDENT HAPPENED, THEY ALL TOOK UP THEIR GUNS AND TRIED TO ATTACK THE PROCESSION OF THE SATSUMA THAT KILLED THOSE ENGLISH MERCHANTS TO TRY TO GET REVENGE...

THE SAILOR'S FRIENDS AND OTHER YOUNG MERCHANTS HAVE GATHERED AND ARE MAKING A FUSS.



I'LL LET THEM KNOW THAT THE OPERATION IS GOING WELL!

LET ME GO TELL THOSE PEOPLE OUTSIDE WHAT'S GOING ON.



WE'LL REALLY END UP WITH A RIOT ON OUR HANDS THIS TIME!

IF THIS PATIENT DIES, IT'LL PROBABLY BE IMPOSSIBLE TO HOLD THEM BACK.



WE HAVE A PROBLEM!

MR. MINA-KATA!



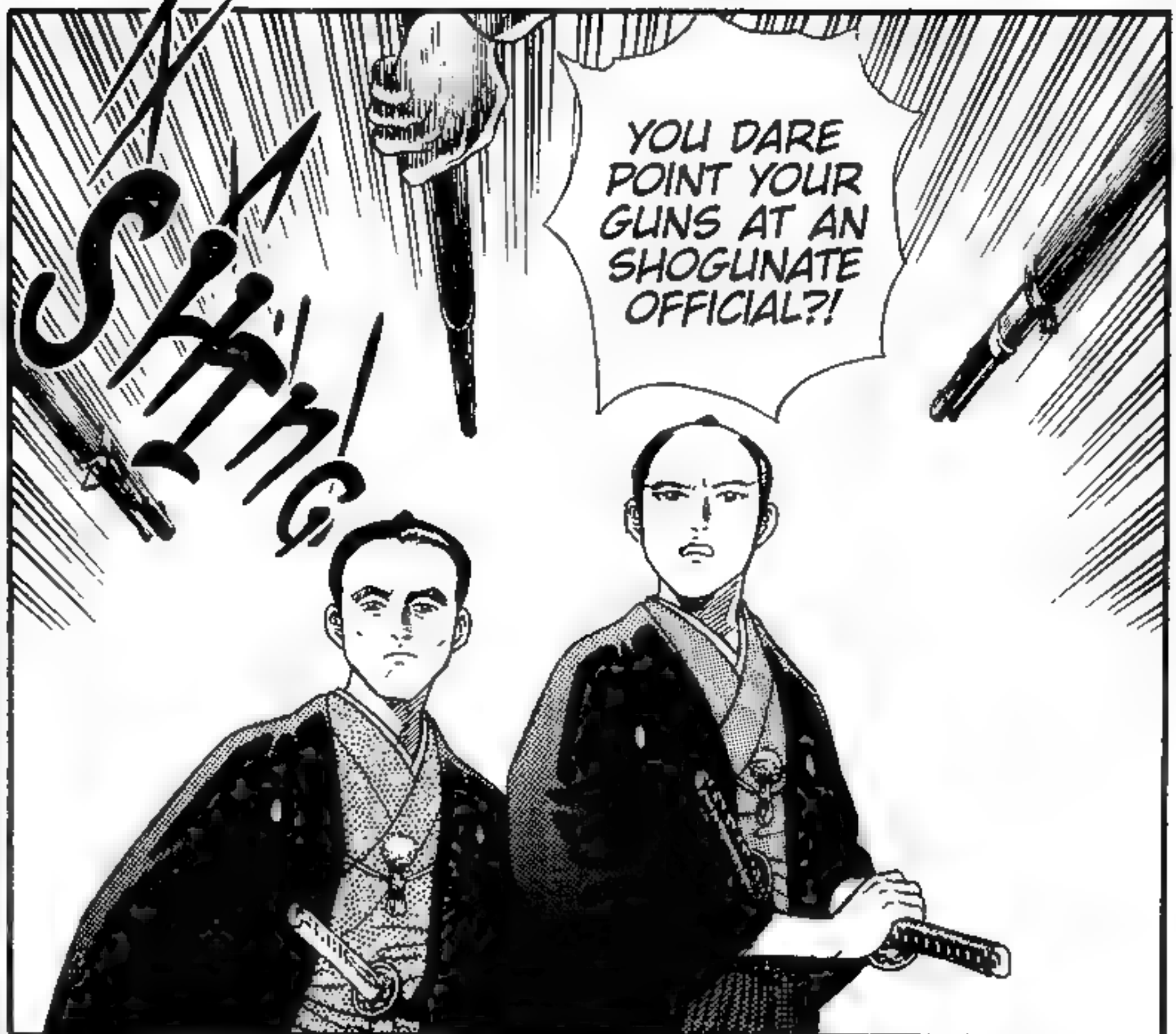
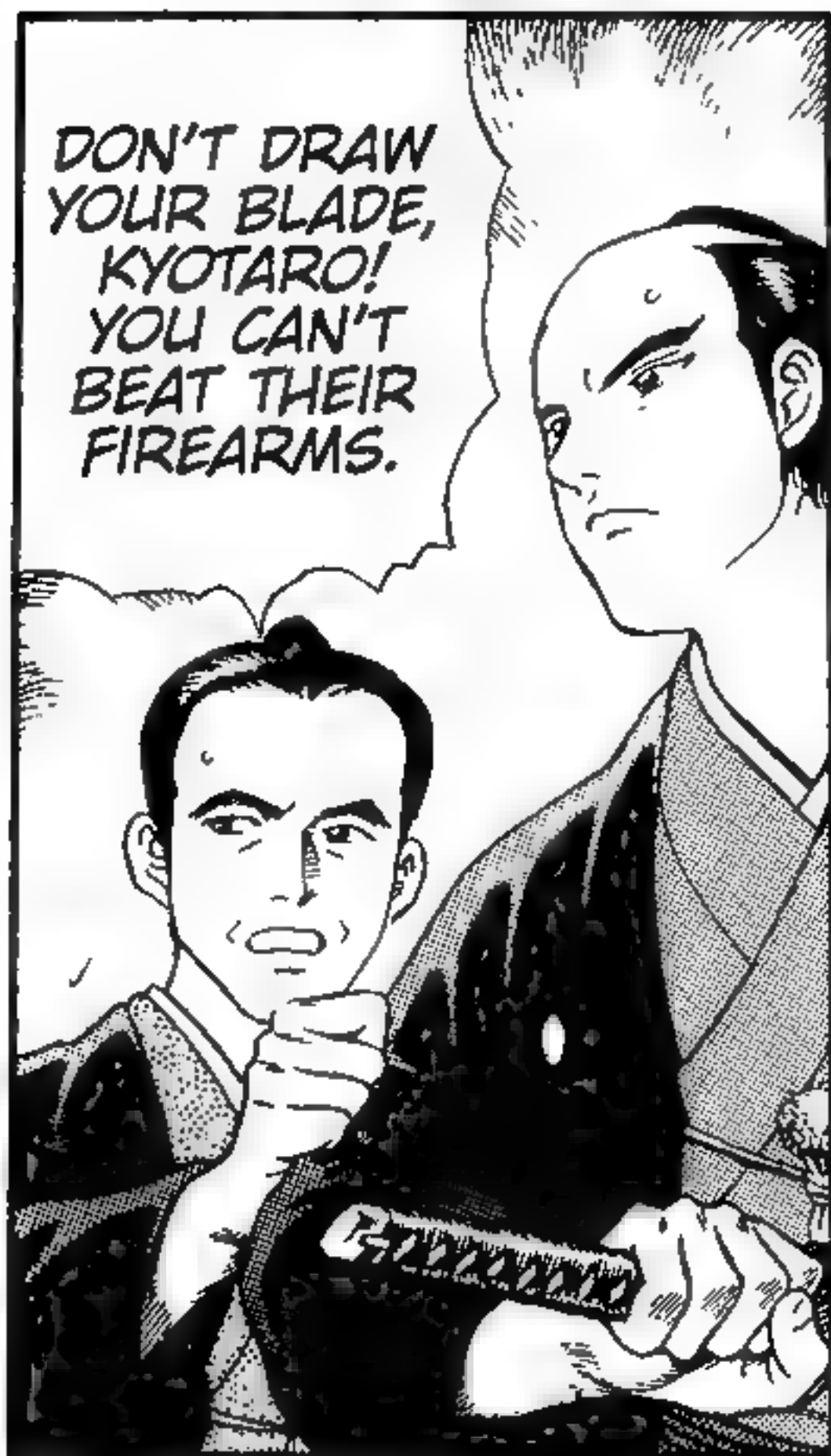
**HE'S NOT  
BREATHING!**







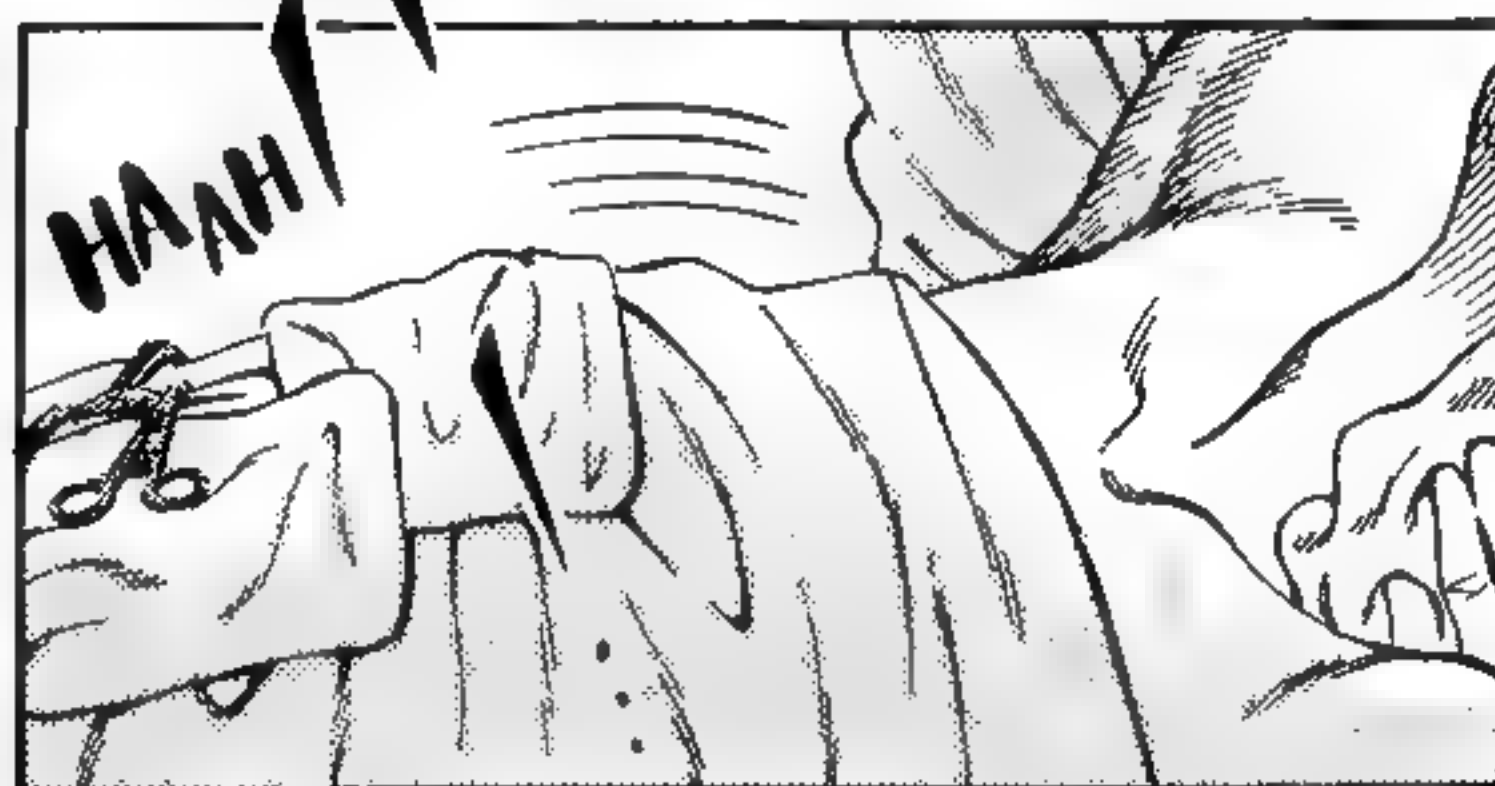
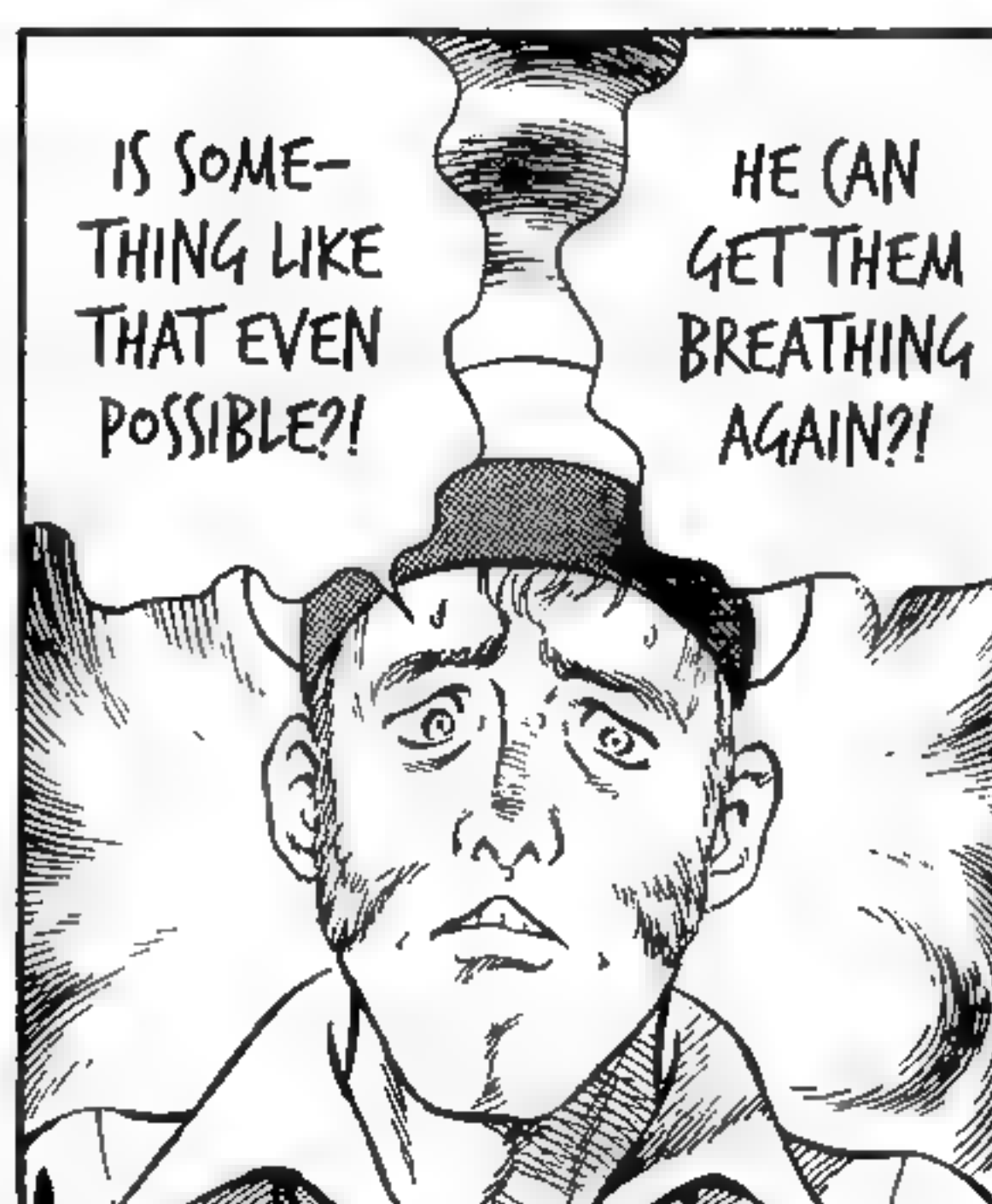




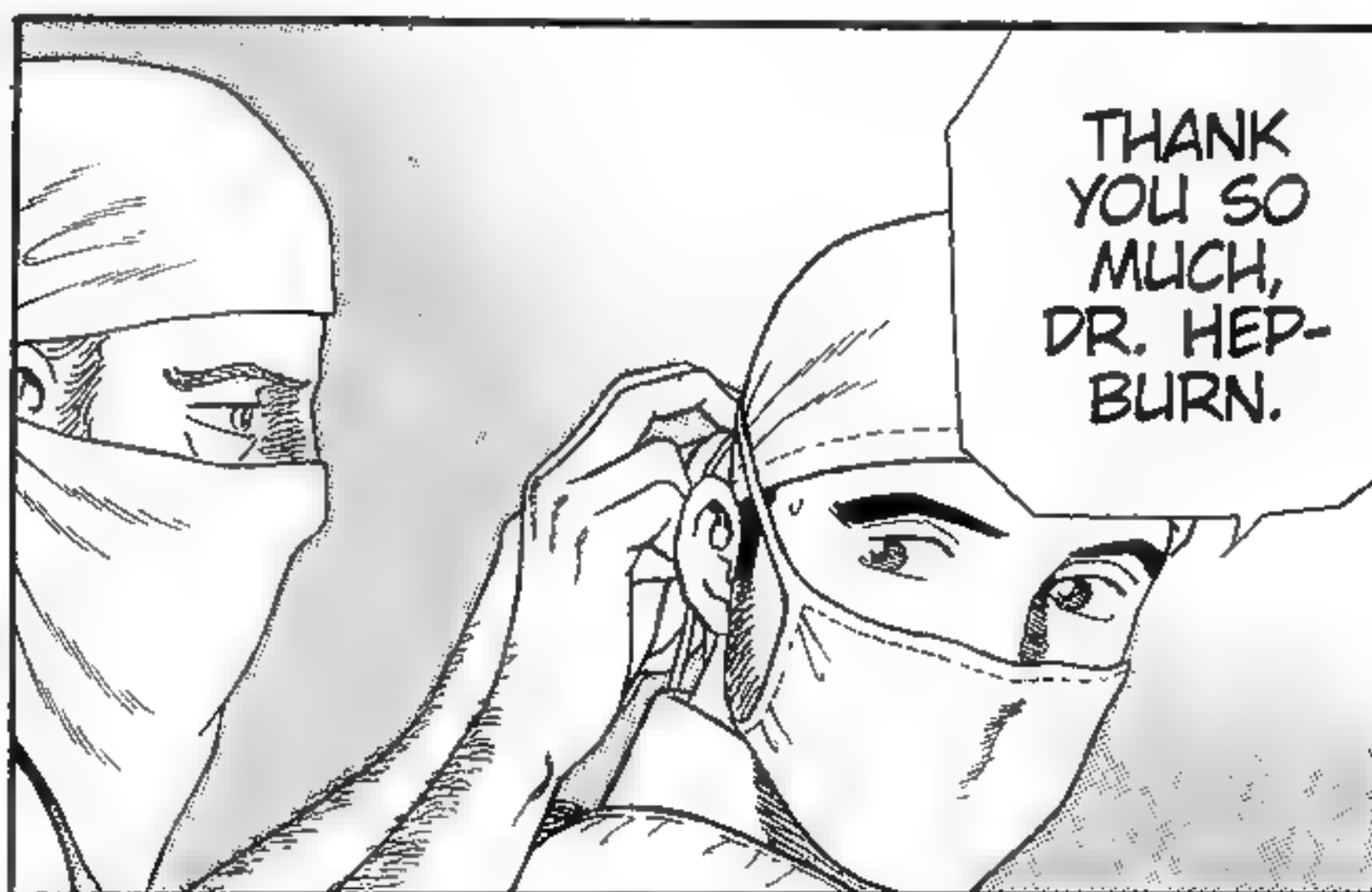
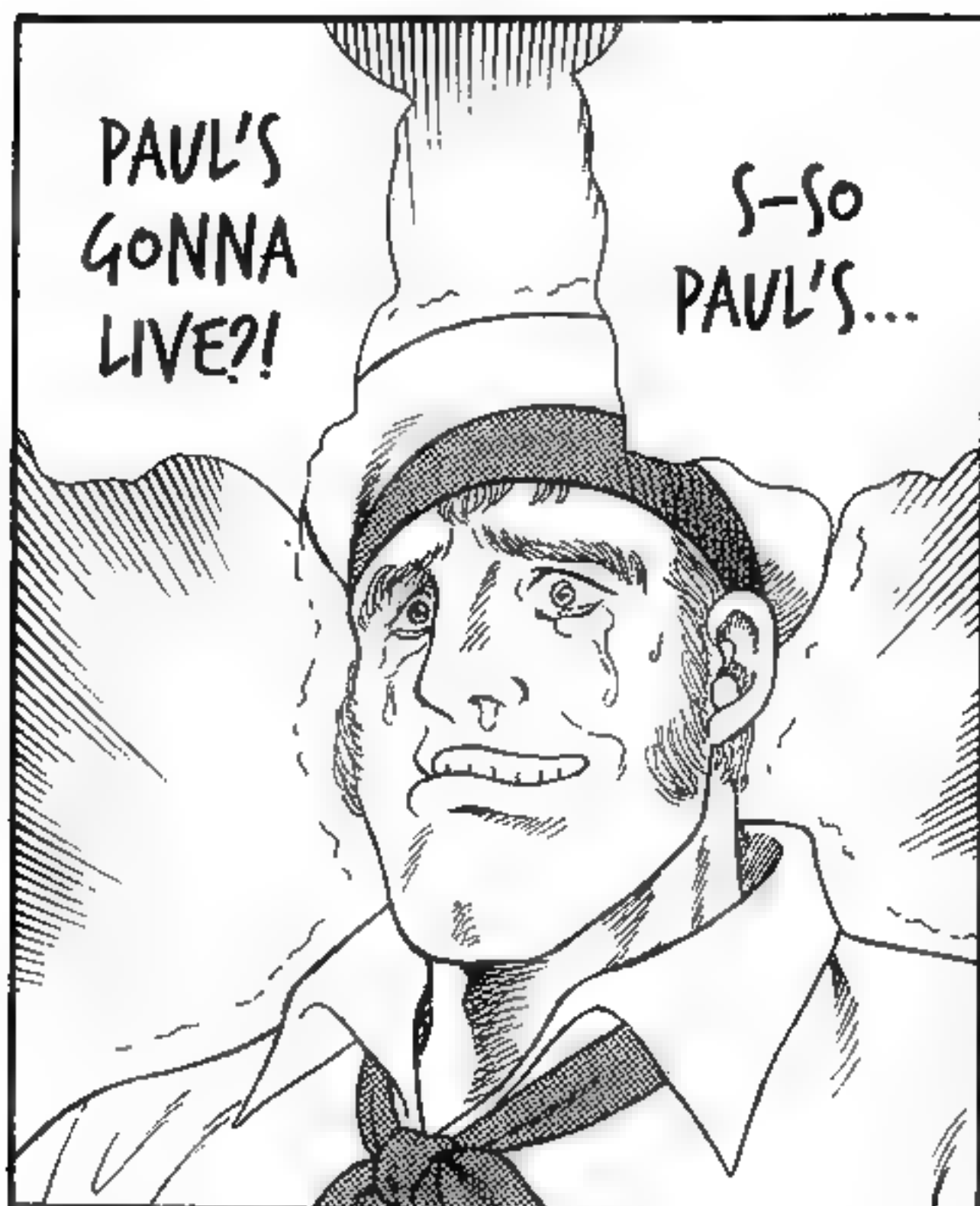












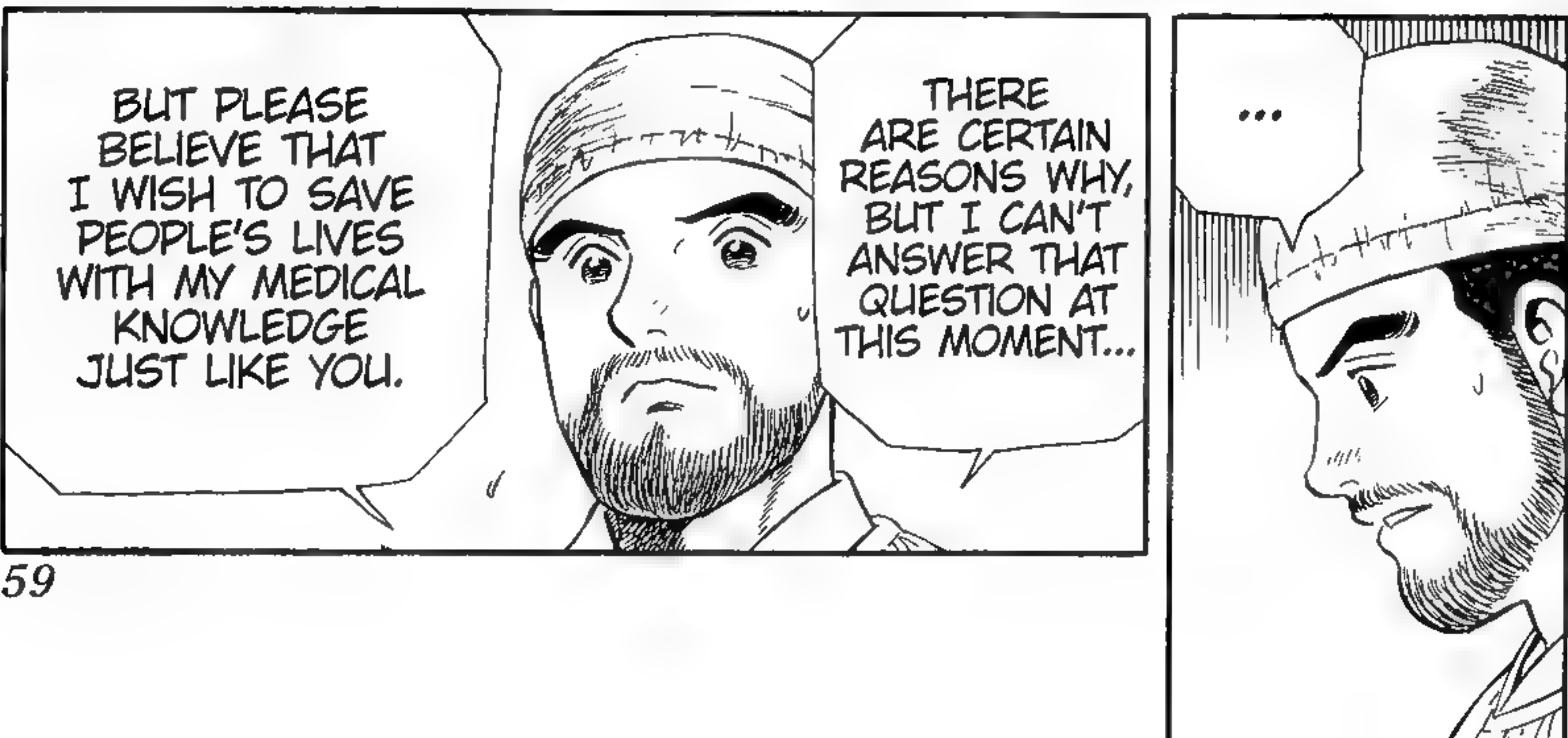
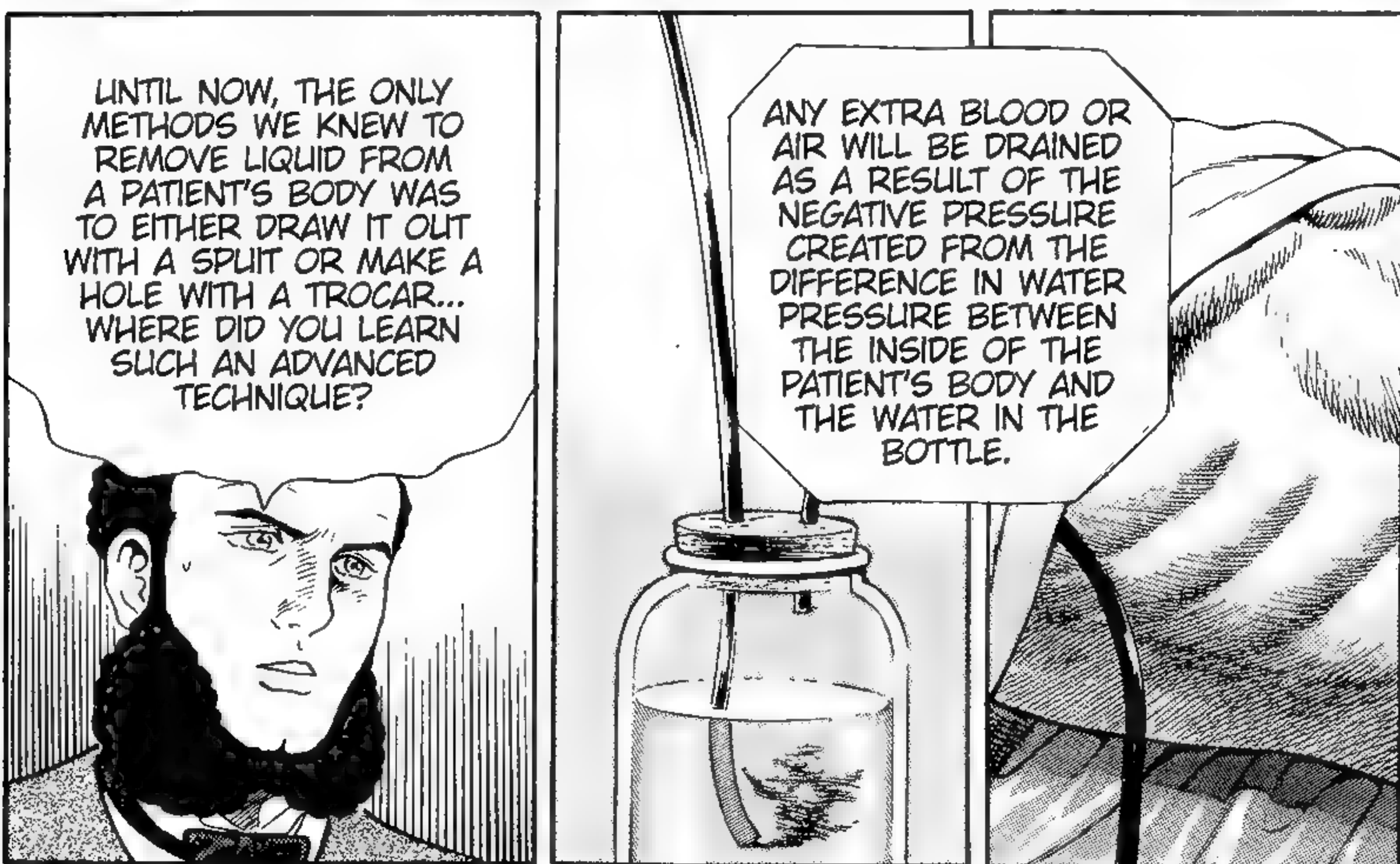




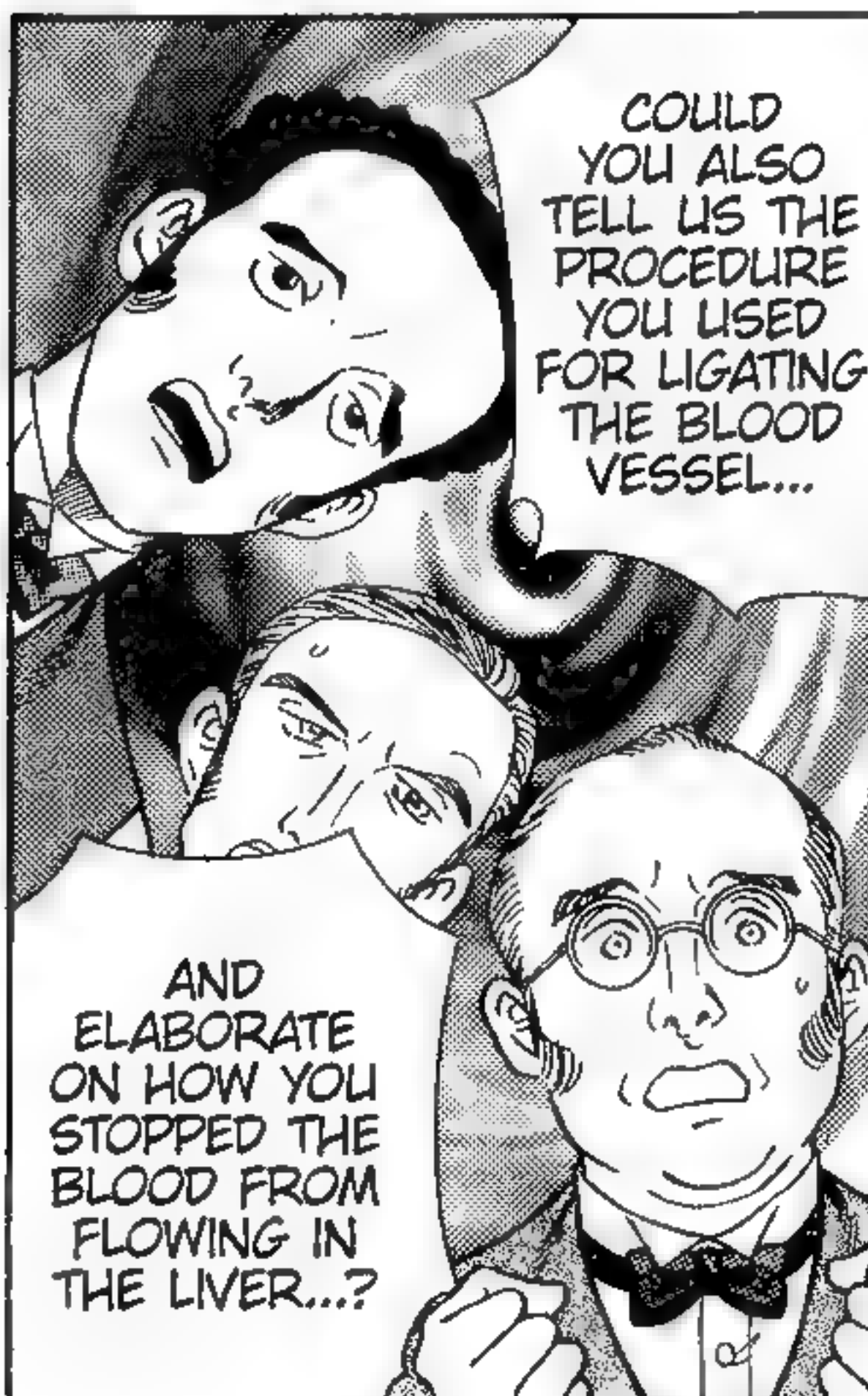
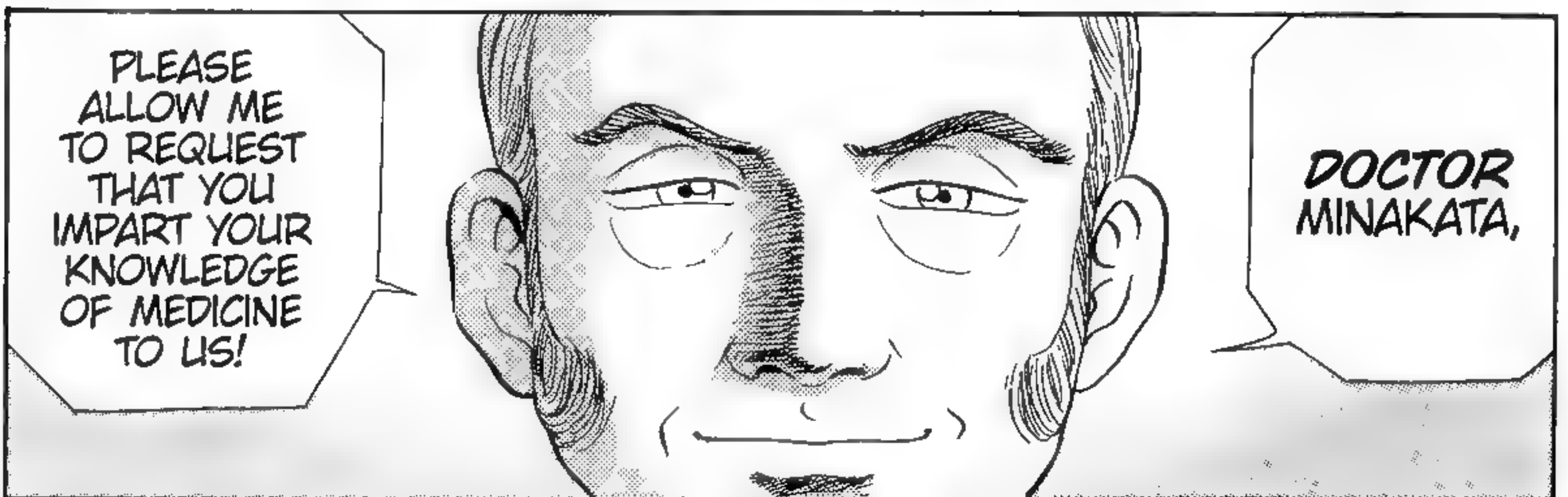
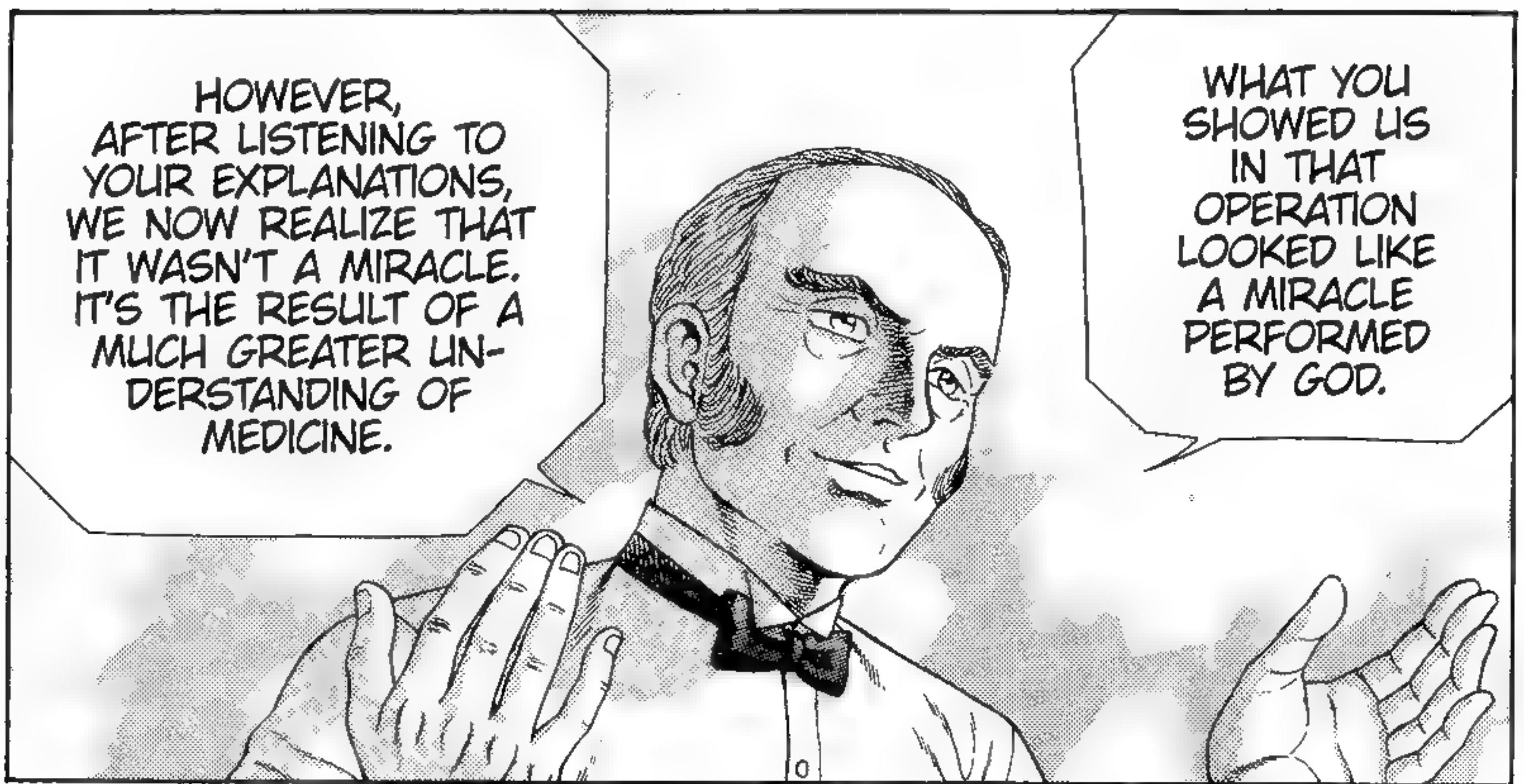








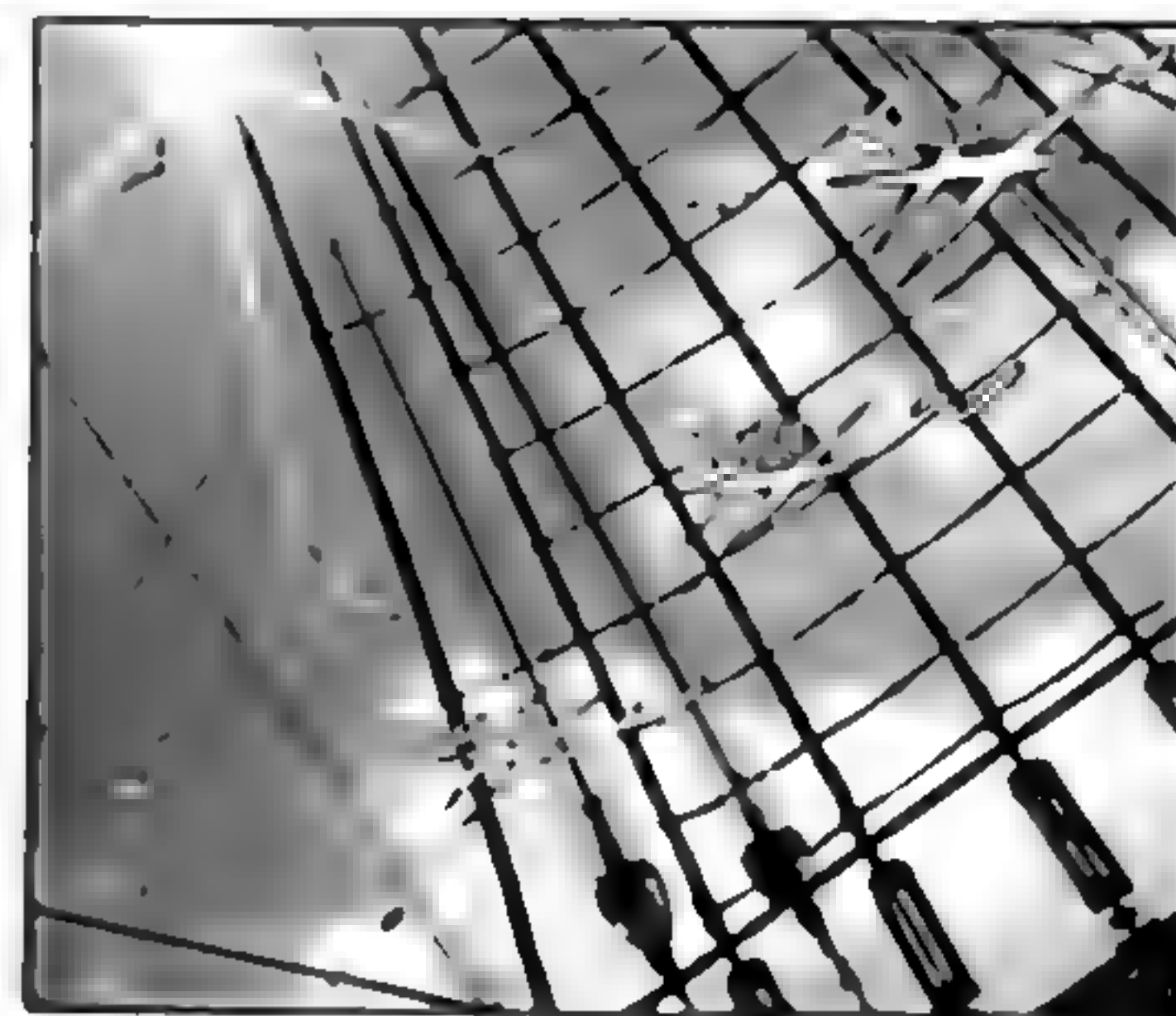
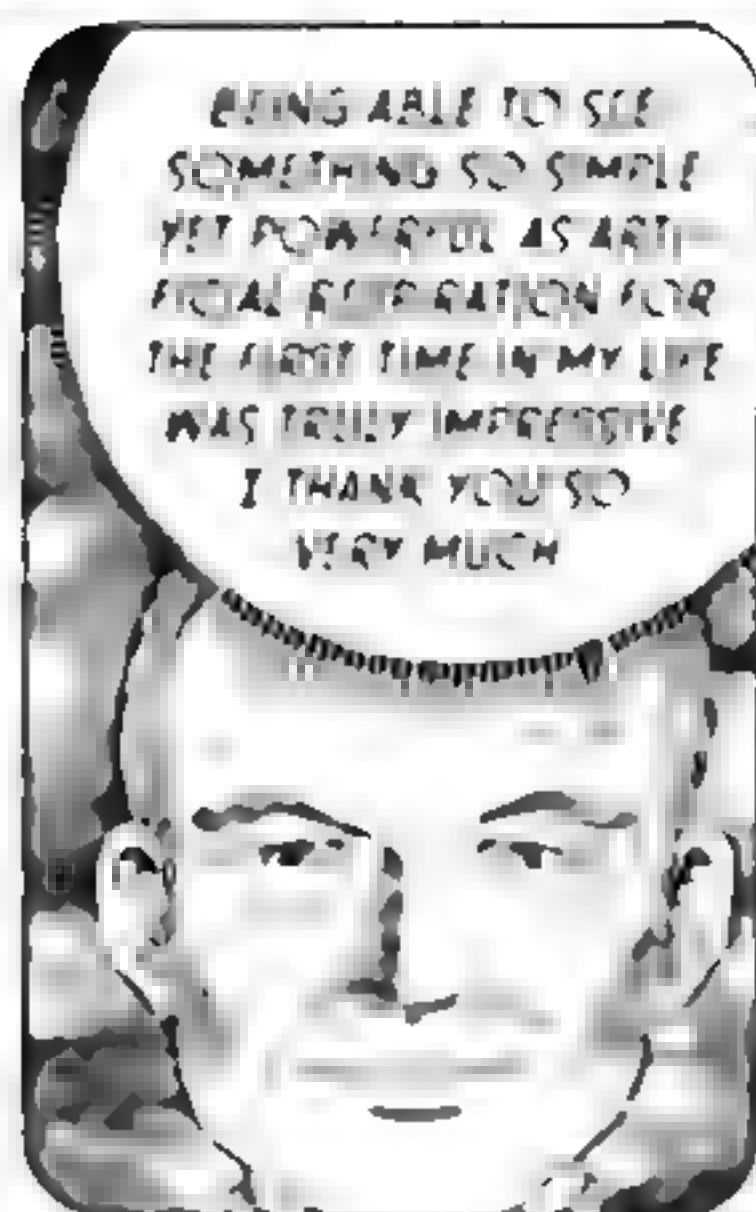




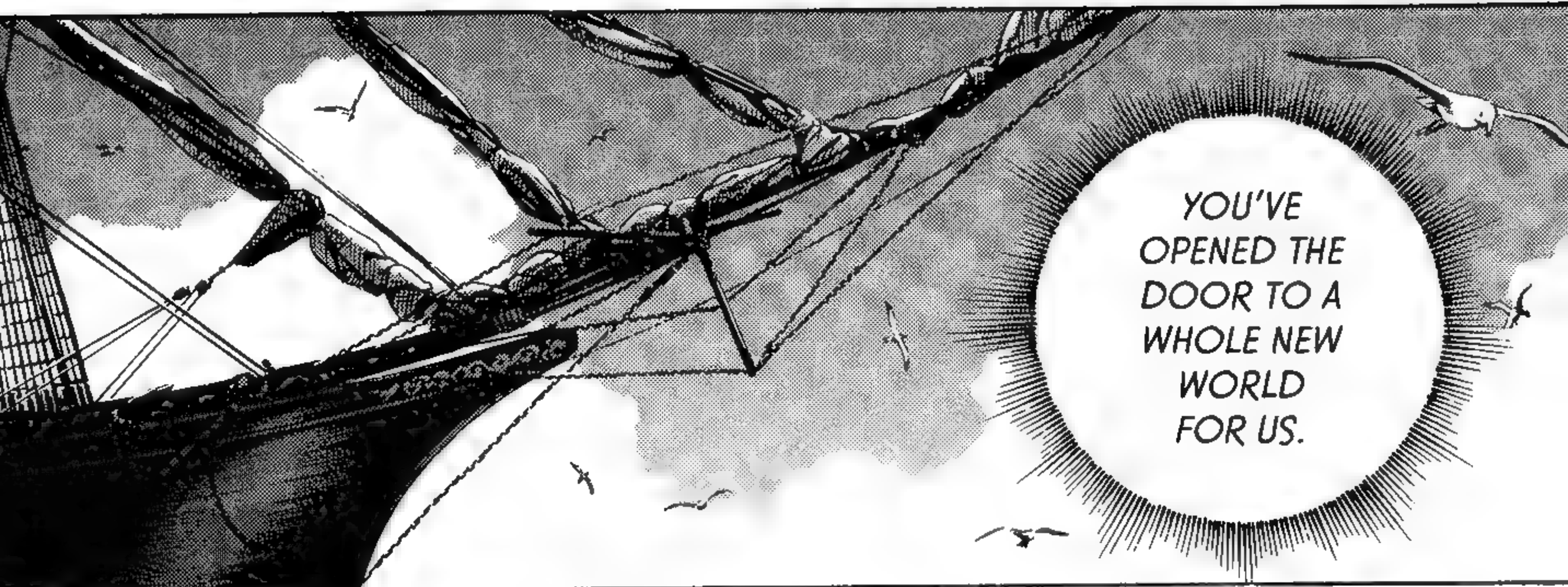












YOU'VE  
OPENED THE  
DOOR TO A  
WHOLE NEW  
WORLD  
FOR US.



YOU DIDN'T  
GET A WINK  
OF SLEEP  
LAST NIGHT,  
DID YOU?

OOF!

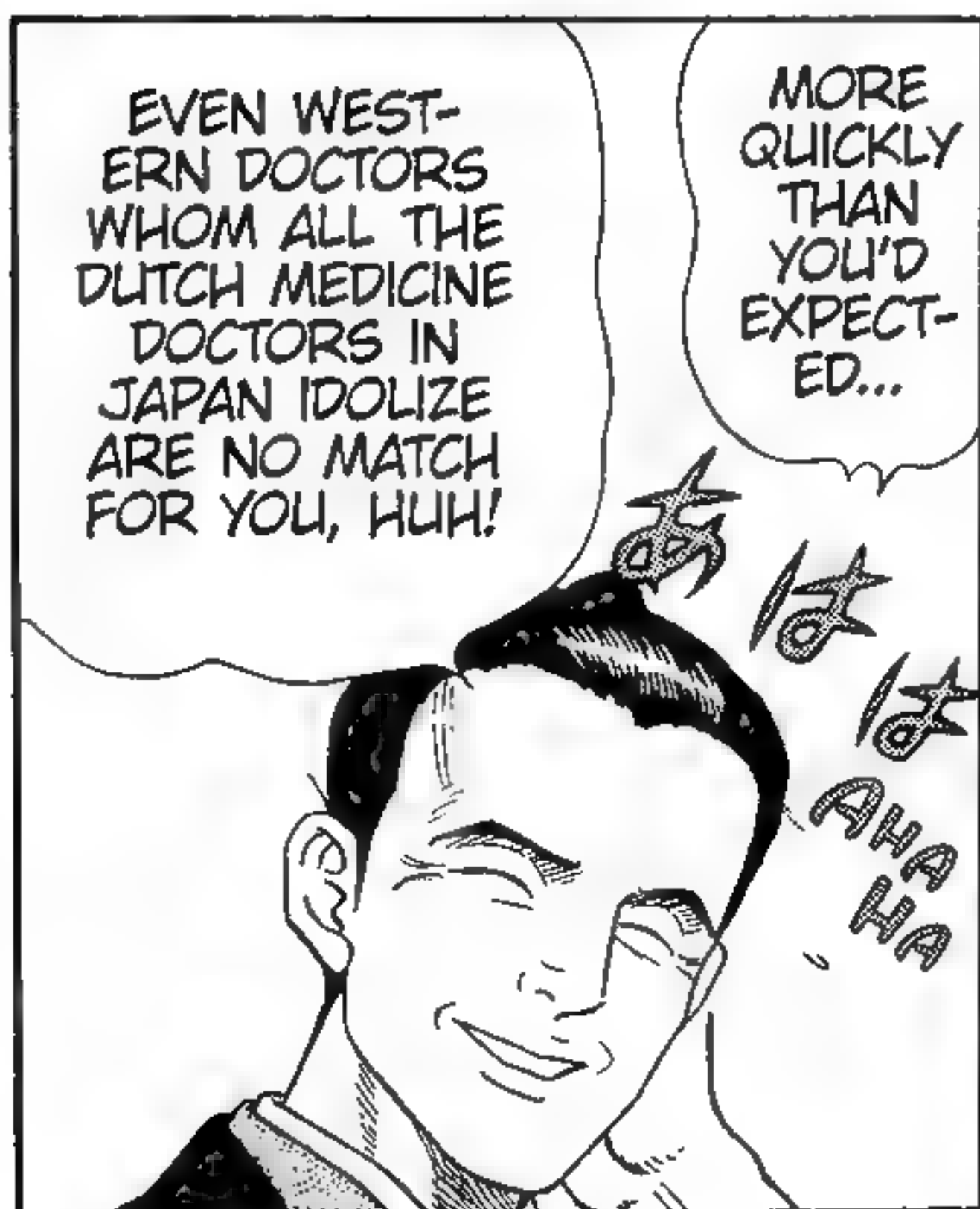
OH,  
THERE'S  
NO NEED  
TO GET  
UP.



AH,  
KATSU-  
SAN.



TAKING  
A NAP,  
SENSEI?



EVEN WEST-  
ERN DOCTORS  
WHOM ALL THE  
DUTCH MEDICINE  
DOCTORS IN  
JAPAN IDOLIZE  
ARE NO MATCH  
FOR YOU, HUH!

MORE  
QUICKLY  
THAN  
YOU'D  
EXPECT-  
ED...

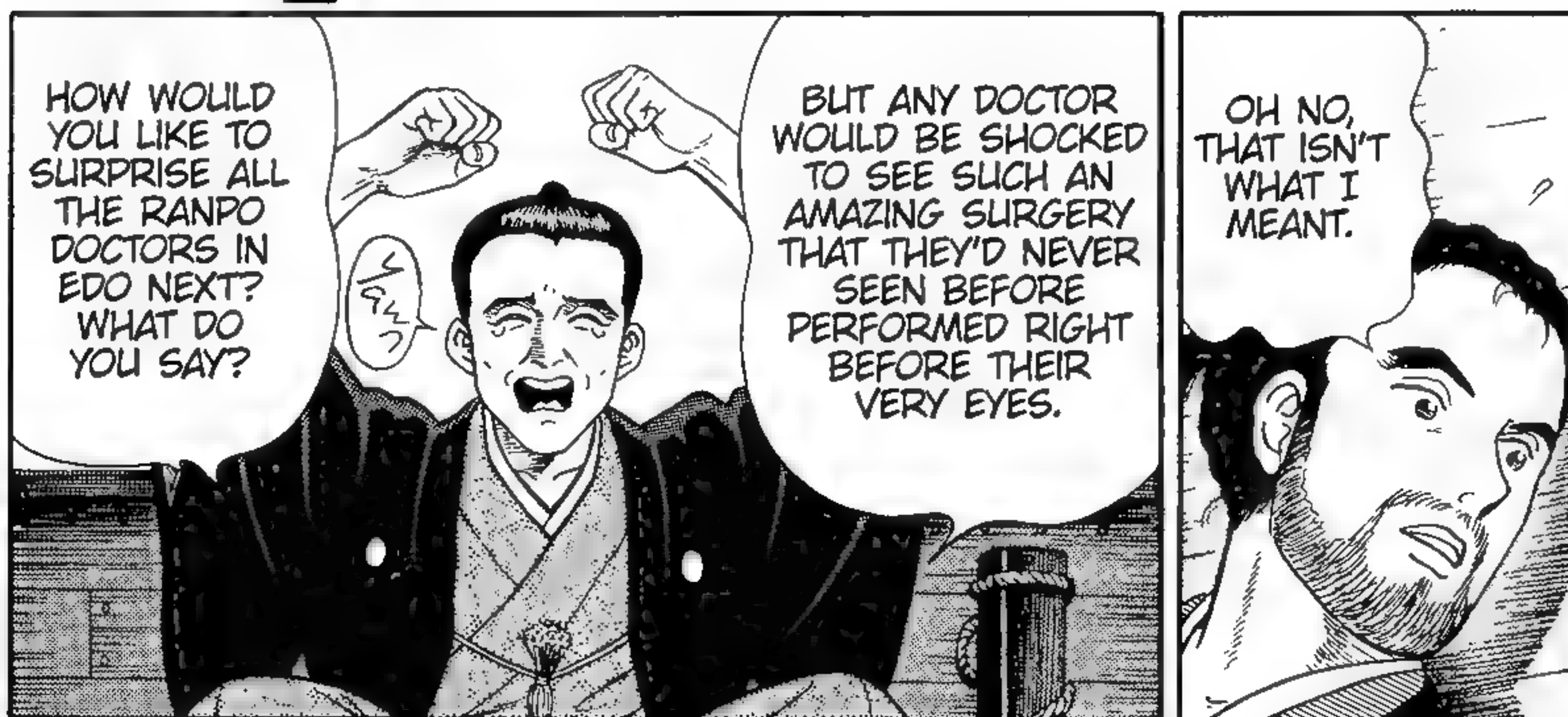
あはは  
AHA  
HA



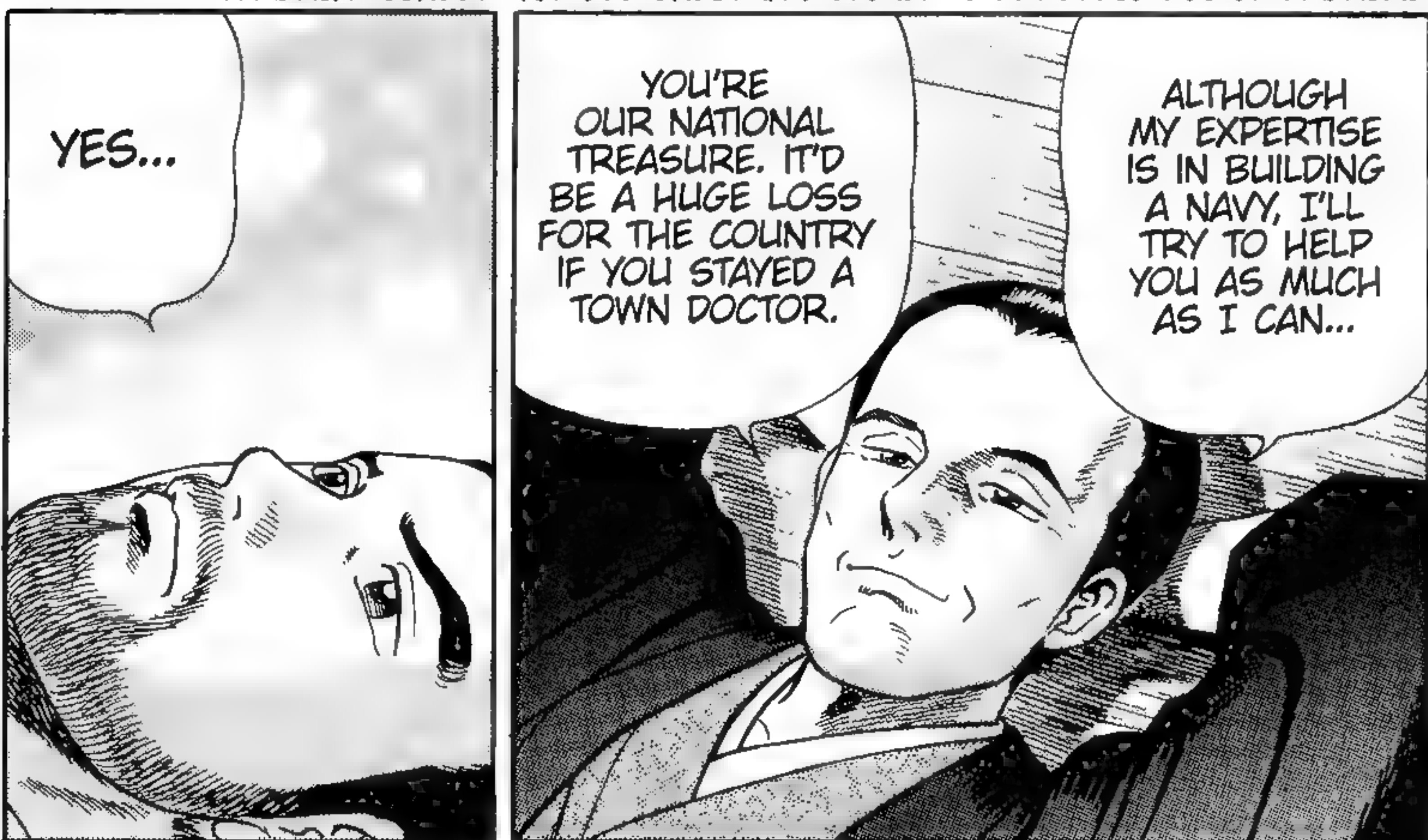
EVERYONE WAS  
SO ENTHUSIASTIC...  
THEY UNDERSTOOD  
WHAT I SAID MORE  
QUICKLY THAN I'D  
EXPECTED... BUT  
THEY'RE DOCTORS  
AFTER ALL...

YEAH...  
I REALLY  
ENJOYED IT  
THOUGH.





\*A MEDICAL SCHOOL THAT EDO SHOGLUNATE OPENED TO INTRODUCE WESTERN MEDICINE.









THE SECOND  
YEAR OF BUNKYU  
(1862.) SUMMER  
HAS ENDED AND  
AUTUMN WAS  
JUST AROUND  
THE CORNER.

## HUMAN CHAPTER PART 3: CHOLERA

HOWEVER,  
SOMETHING  
WAS A BIT  
STRANGE...

IT SEEMED  
THE MEASLES  
OUTBREAK  
THAT STARTED  
AROUND JUNE  
THAT YEAR HAD  
BEGUN TO  
WIND DOWN.



## HUMAN CHAPTER PART 3: CHOLERA



I WAS SEEING  
FEWER AND FEWER  
PEOPLE AROUND  
IN THE DISTRICT OF  
NIHONBASHI WHERE  
IT WAS NORMALLY  
BUSTLING WITH  
ACTIVITY

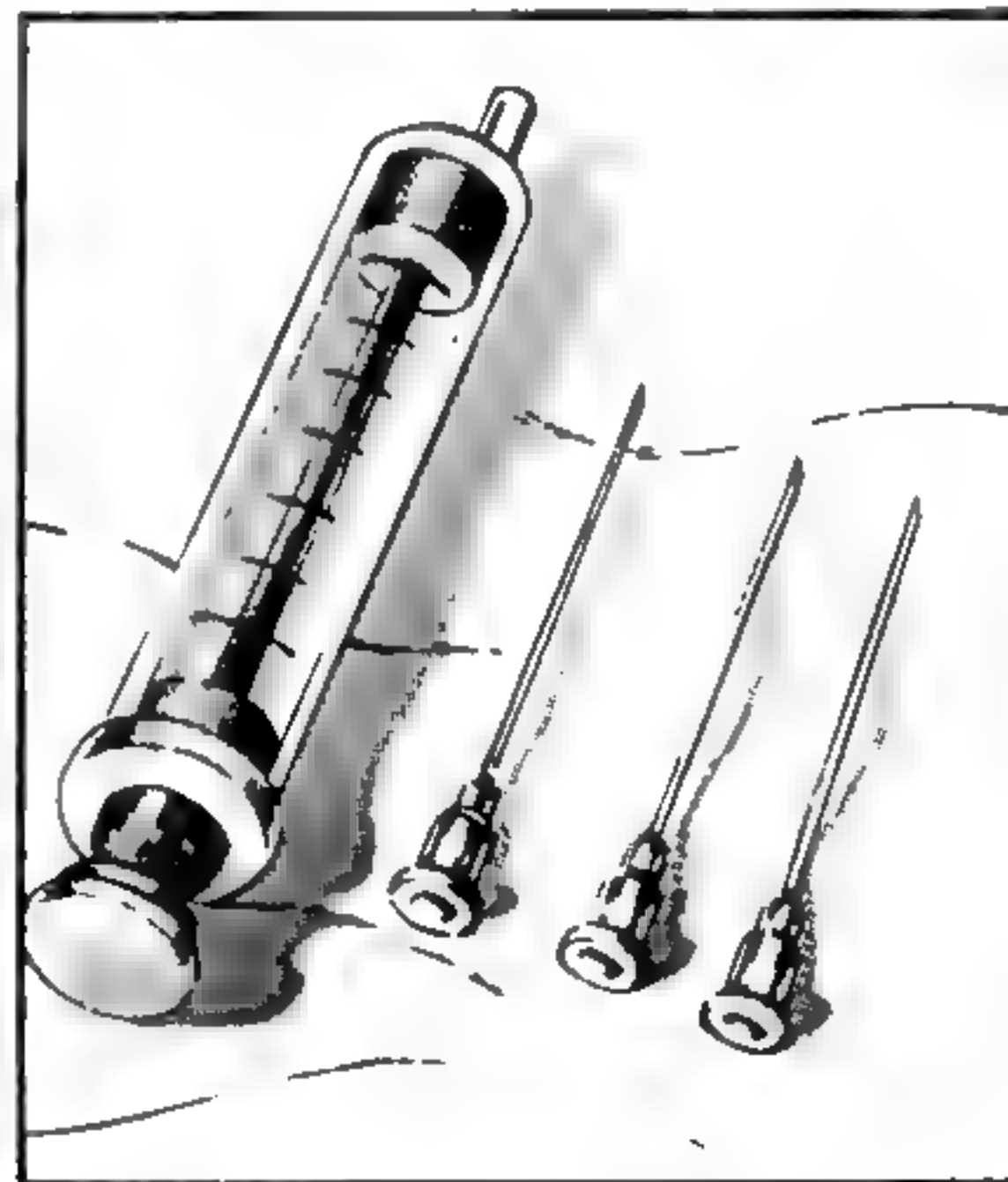
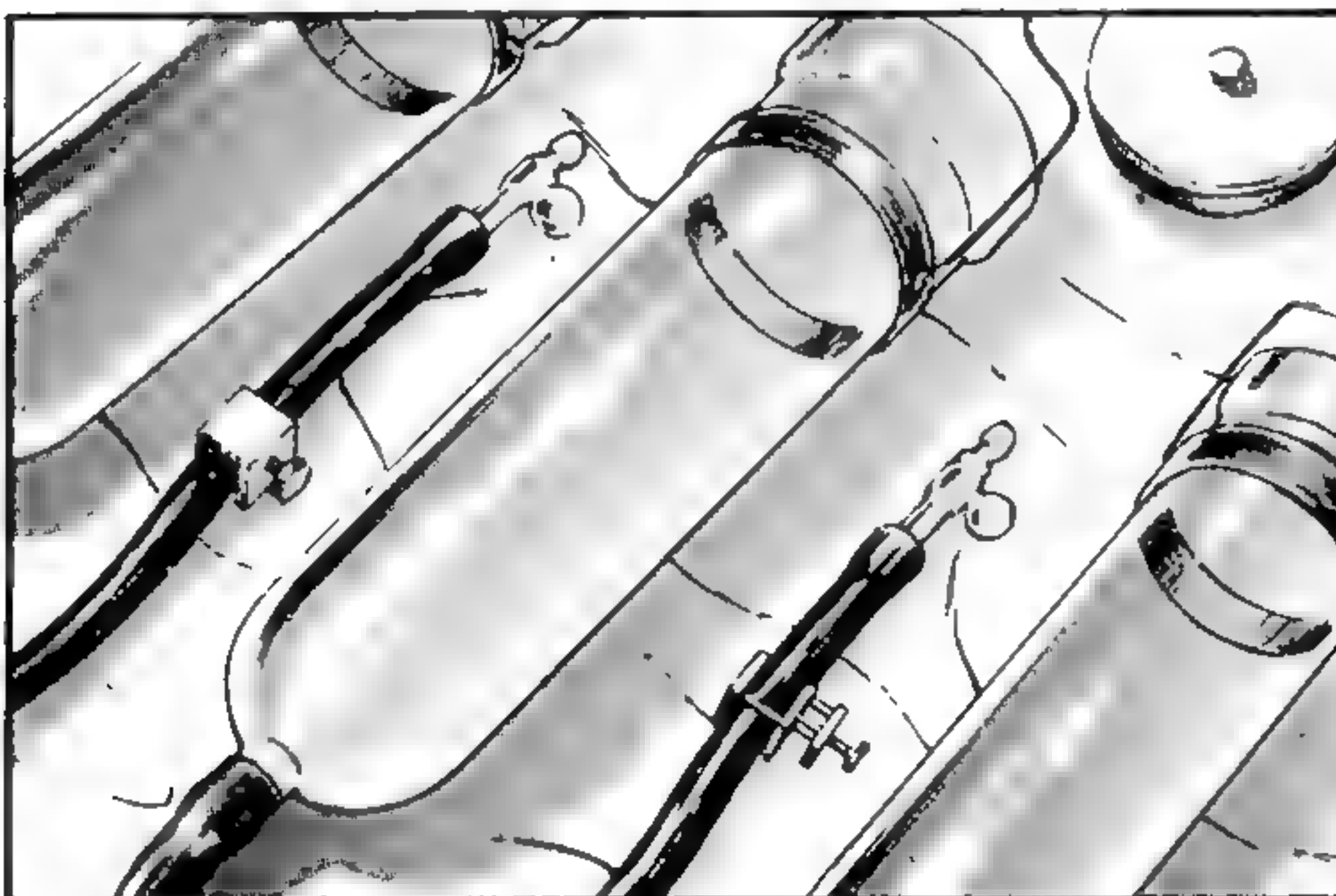
THIS WAS  
BECAUSE  
YET ANOTHER  
PLAGUE WAS  
THREATENING  
THE POPULATION  
AFTER ALL  
THIS TIME





IT WAS  
CHOLERA.

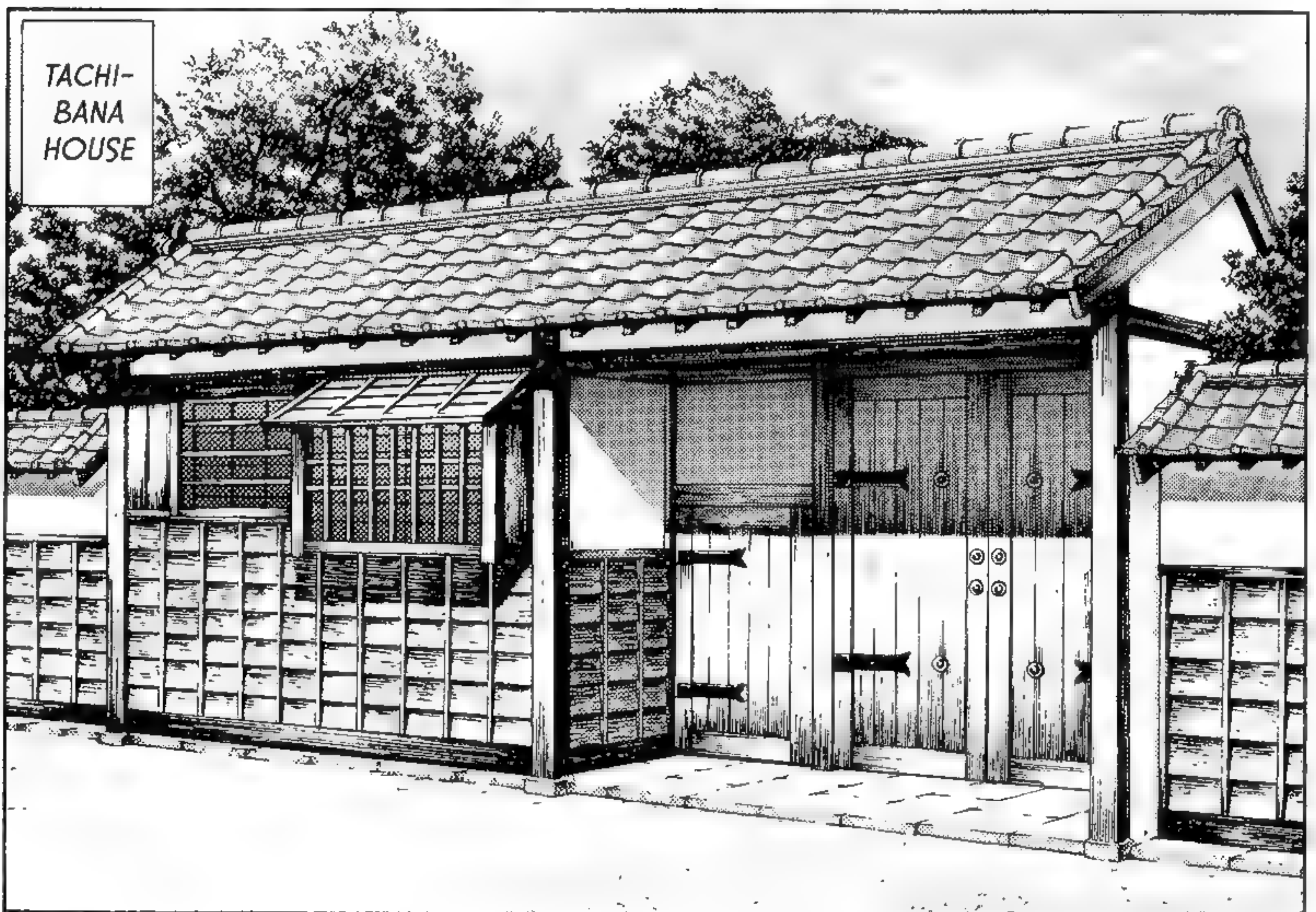
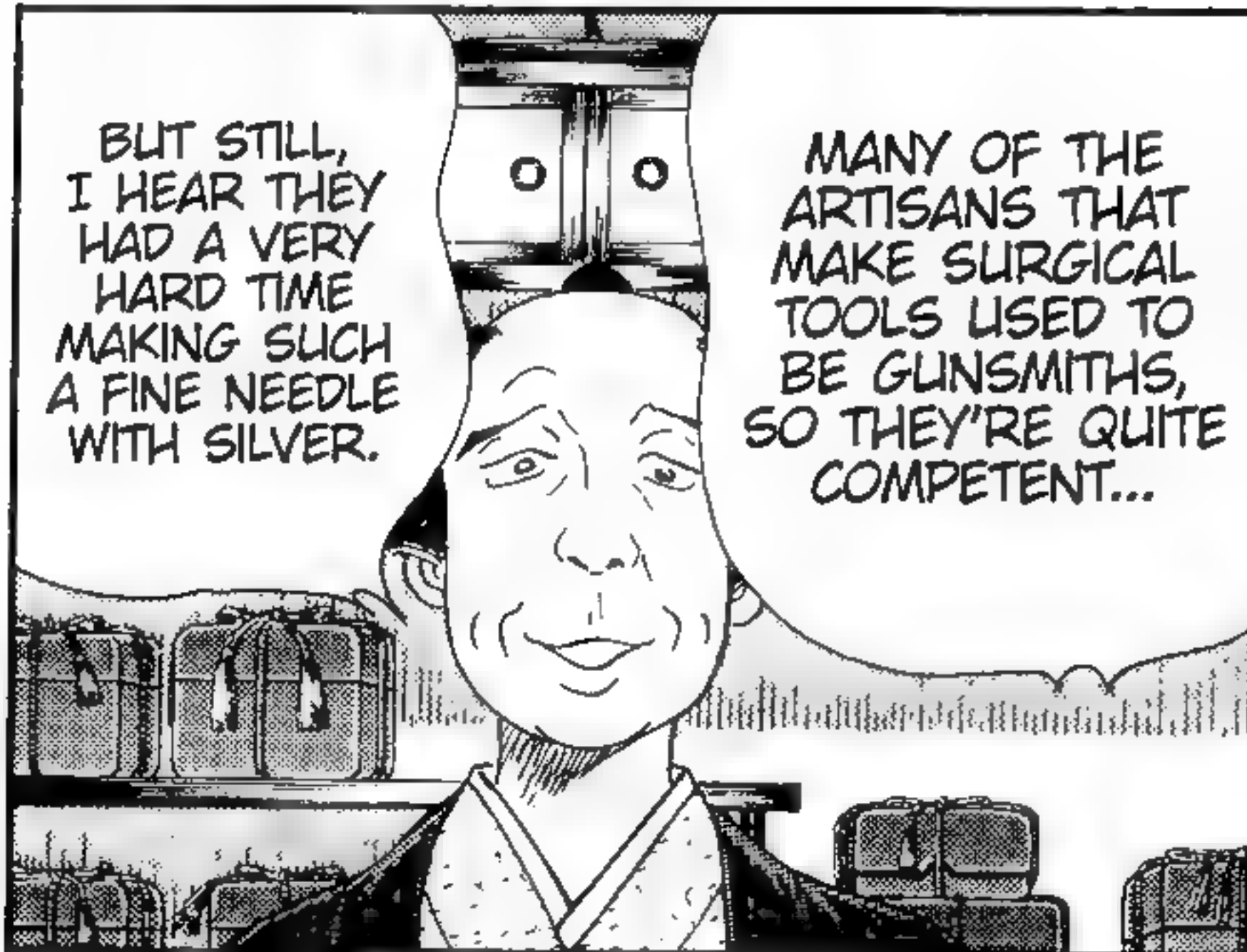
GOOD  
AFTER-  
NOON!



I ORDERED  
SOME ARTISANS  
WHO SPECIALIZE IN  
SURGICAL TOOLS TO  
DO THEIR BEST TO  
CREATE SOMETHING  
AS CLOSE AS THEY  
COULD TO WHAT  
YOU INDICATED...

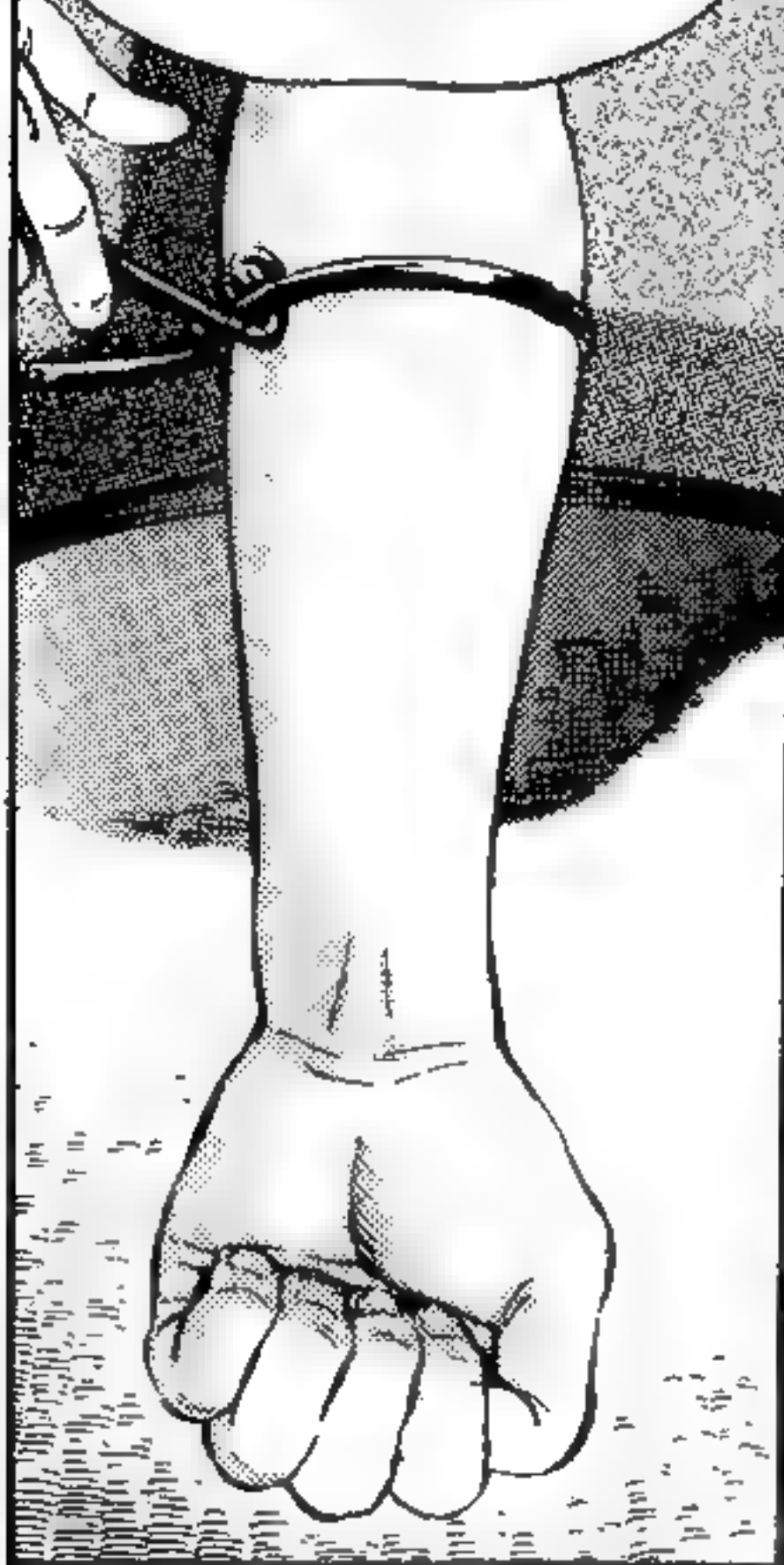
WHAT  
DO YOU  
THINK?







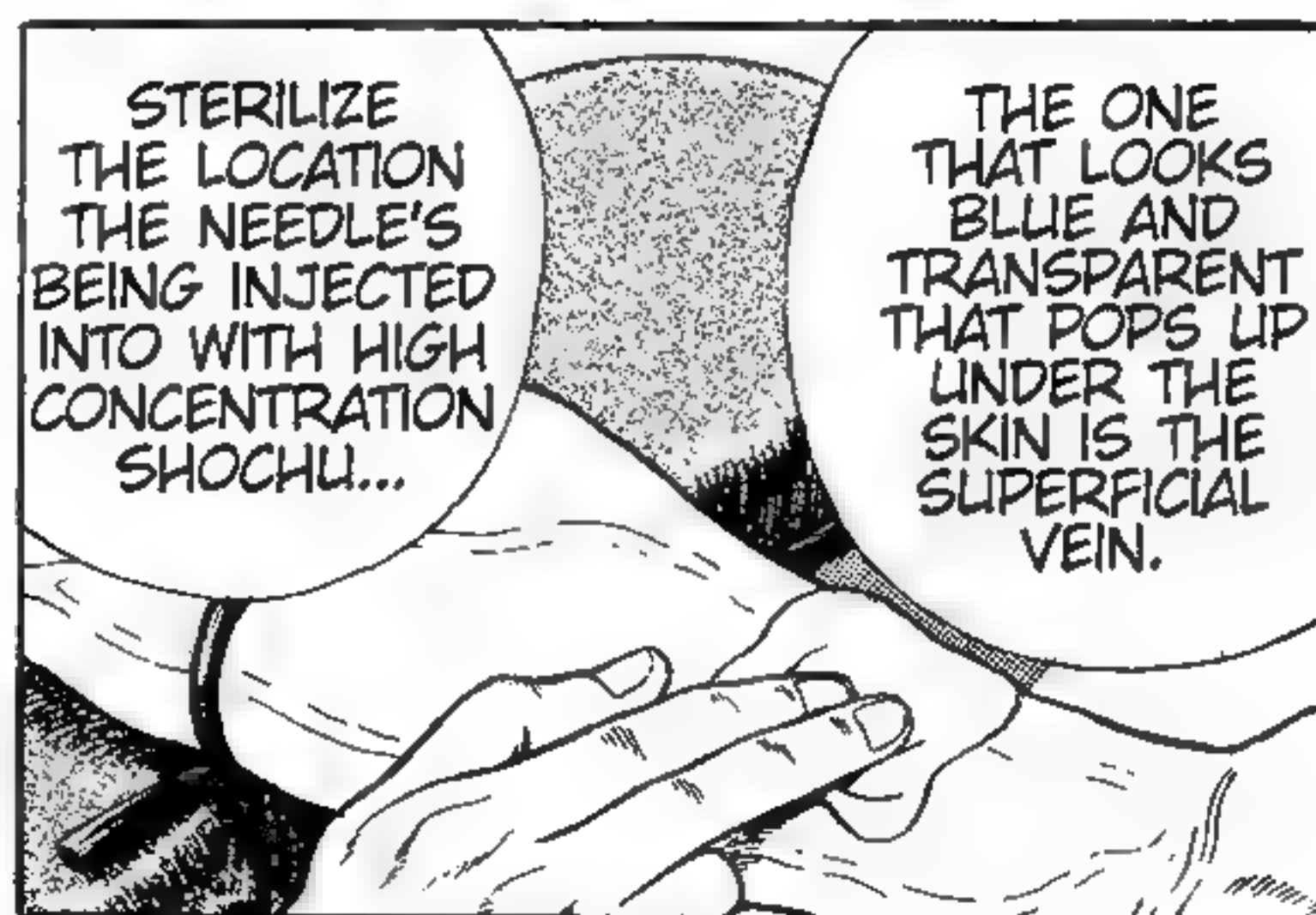
TIE A RUBBER CORD AROUND A LOCATION NEAR THE HEART AND MAKE SURE THE PATIENT MAKES A FIST WITH HIS THUMB INSIDE THE OTHER FINGERS LIKE THIS.



YOU HAVE TO BE CAREFUL NOT TO PRICK TOO DEEP, OTHERWISE IT WILL PIERCE THROUGH IT, AND BLOOD WILL LEAK OUT UNDER THE SKIN.

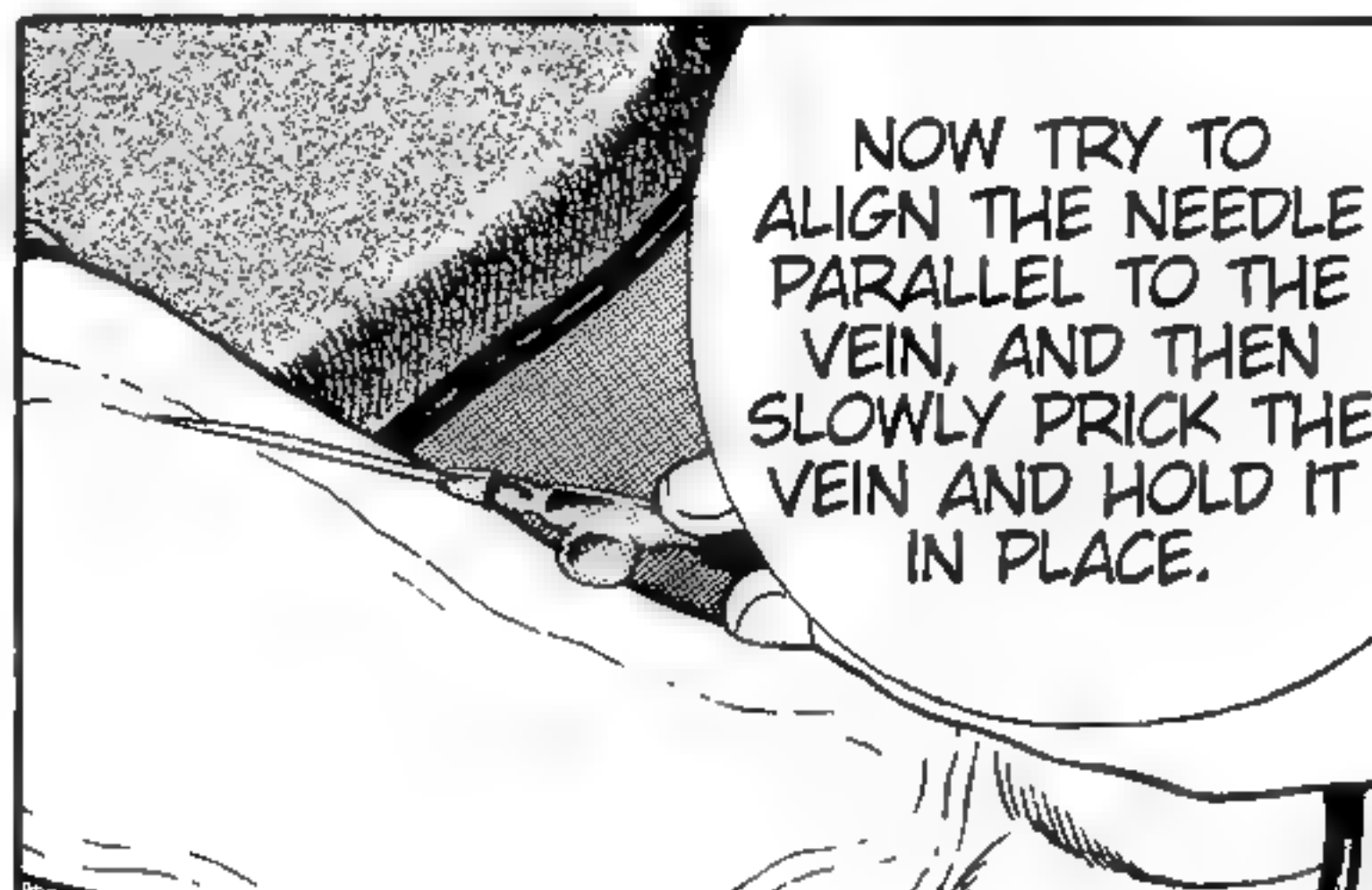


STERILIZE THE LOCATION THE NEEDLE'S BEING INJECTED INTO WITH HIGH CONCENTRATION SHOCHU...

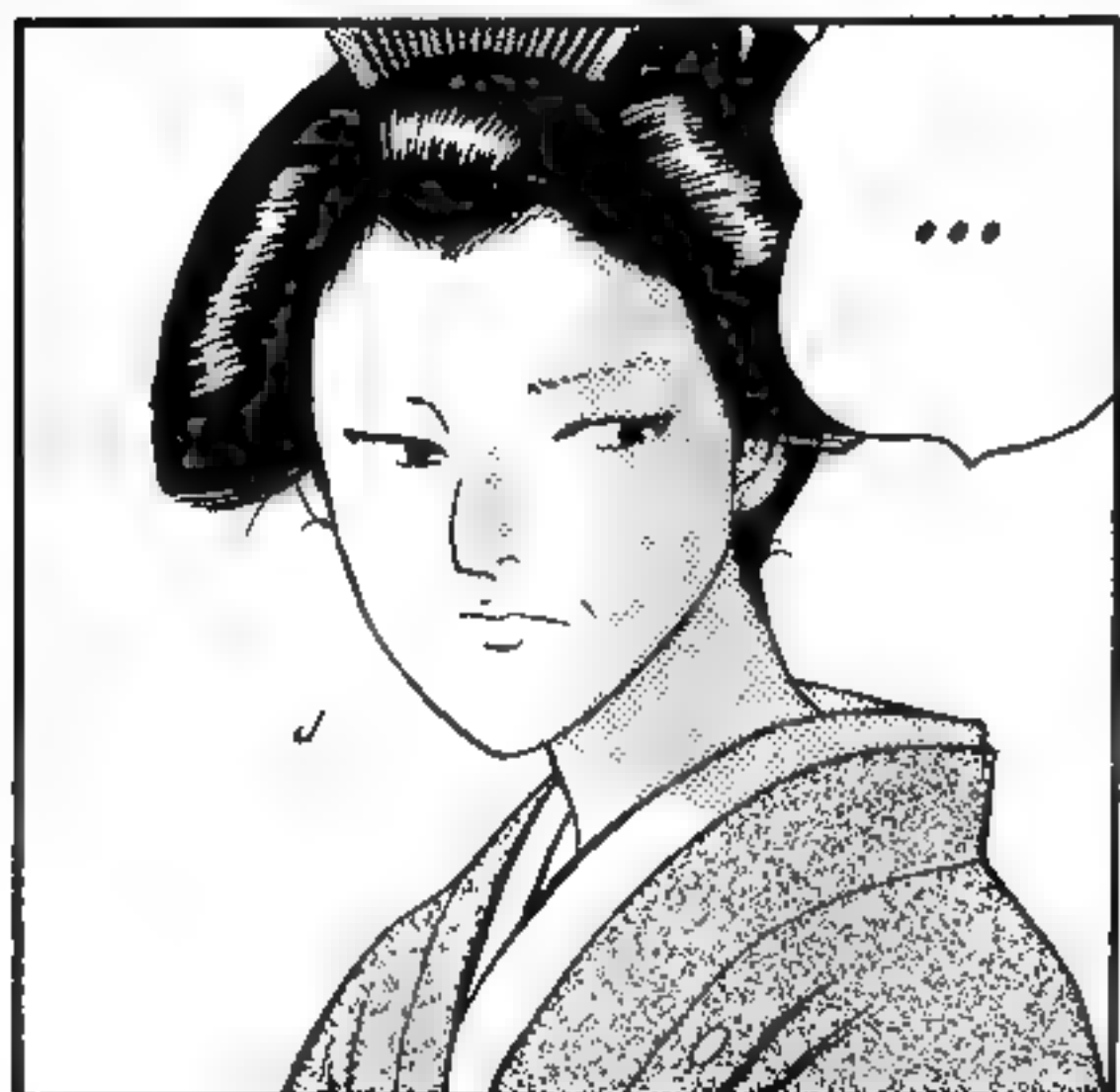
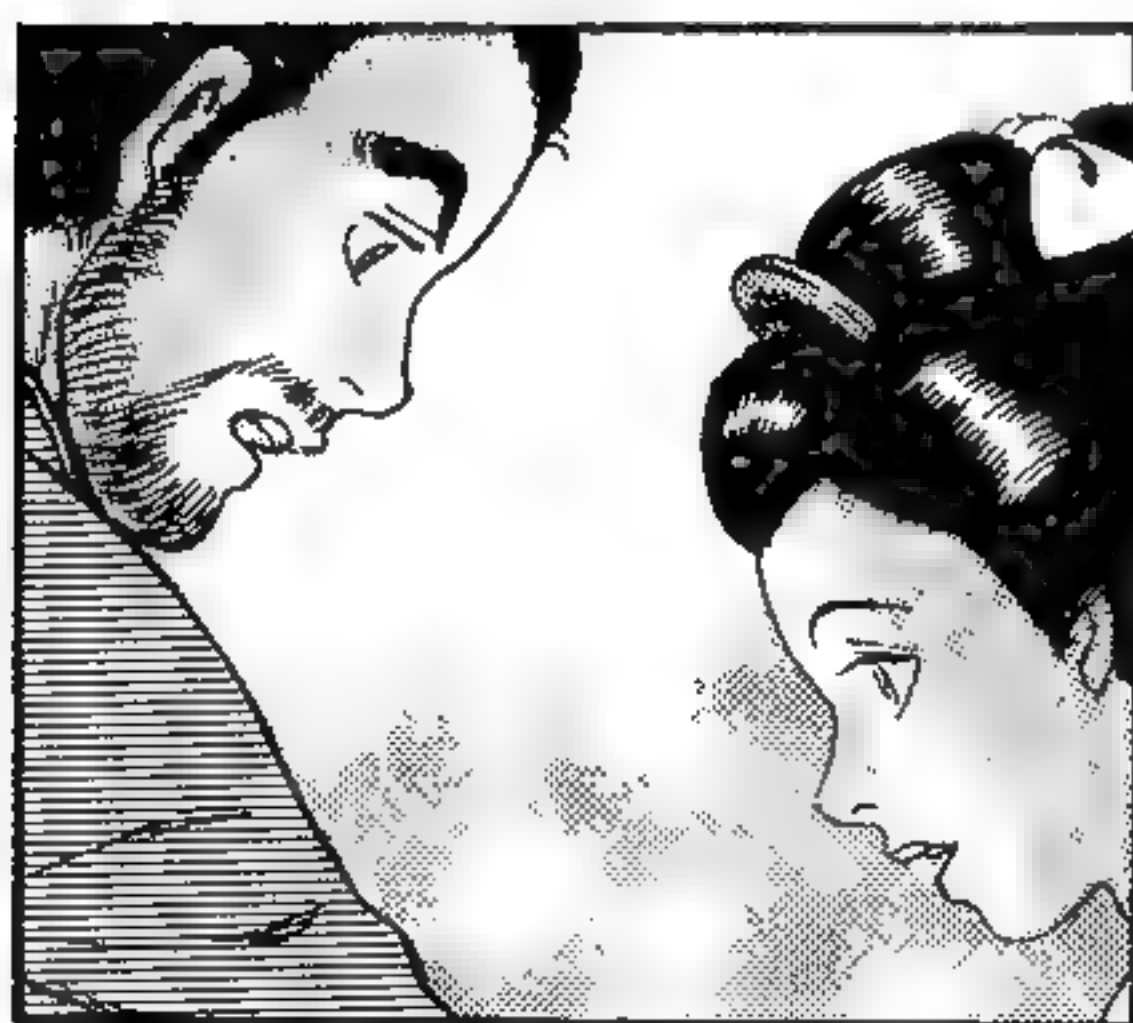
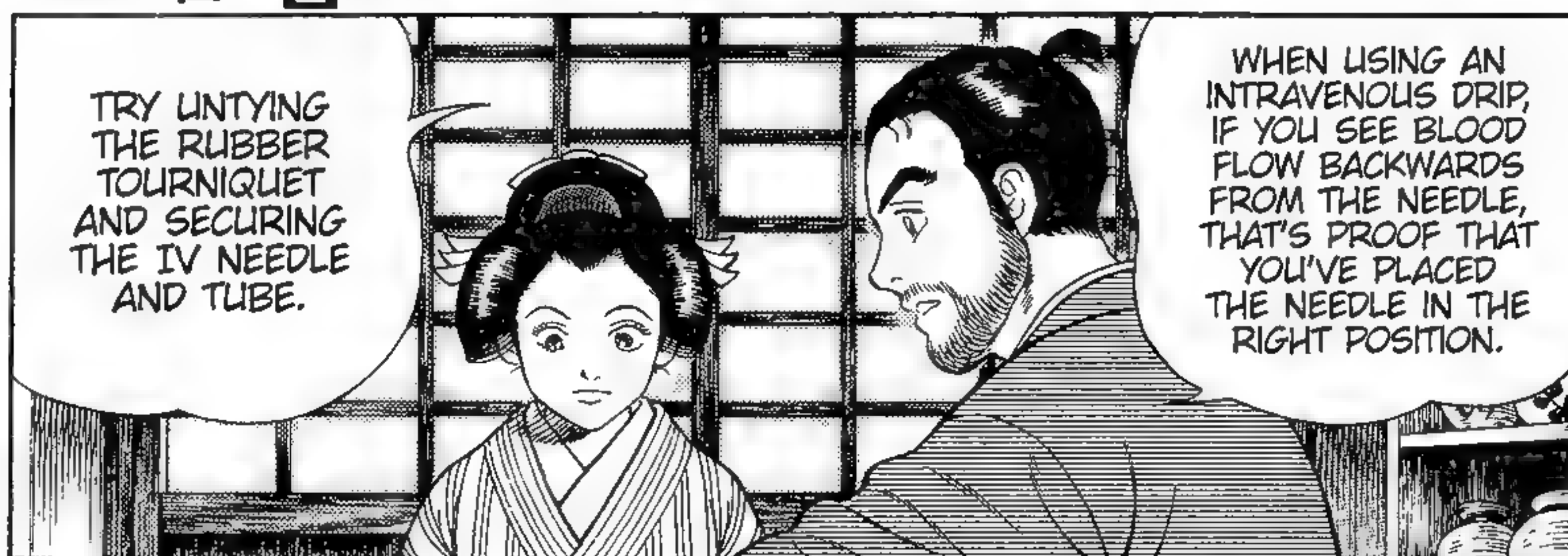


THE ONE THAT LOOKS BLUE AND TRANSPARENT THAT POPS UP UNDER THE SKIN IS THE SUPERFICIAL VEIN.

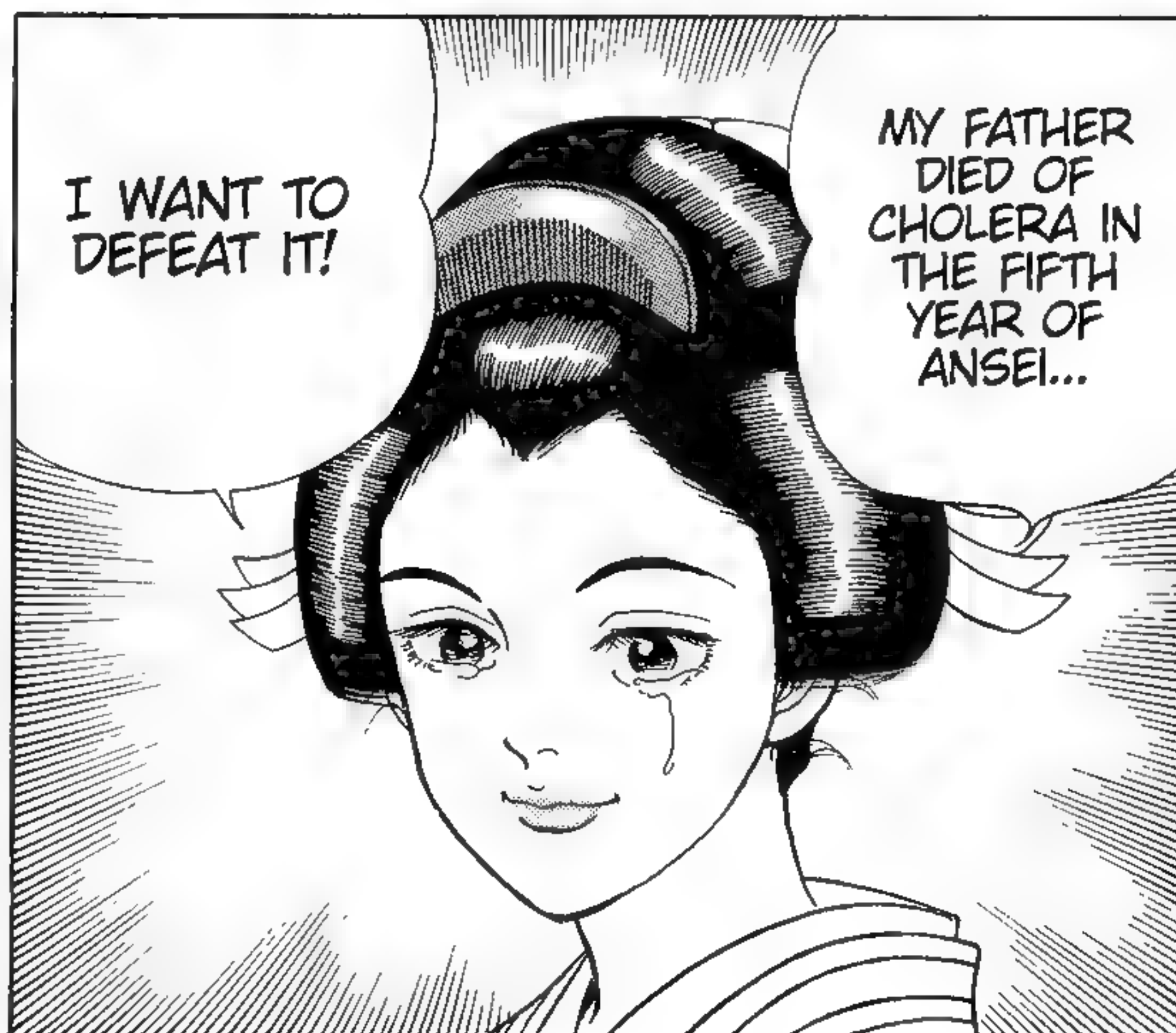
NOW TRY TO ALIGN THE NEEDLE PARALLEL TO THE VEIN, AND THEN SLOWLY PRICK THE VEIN AND HOLD IT IN PLACE.



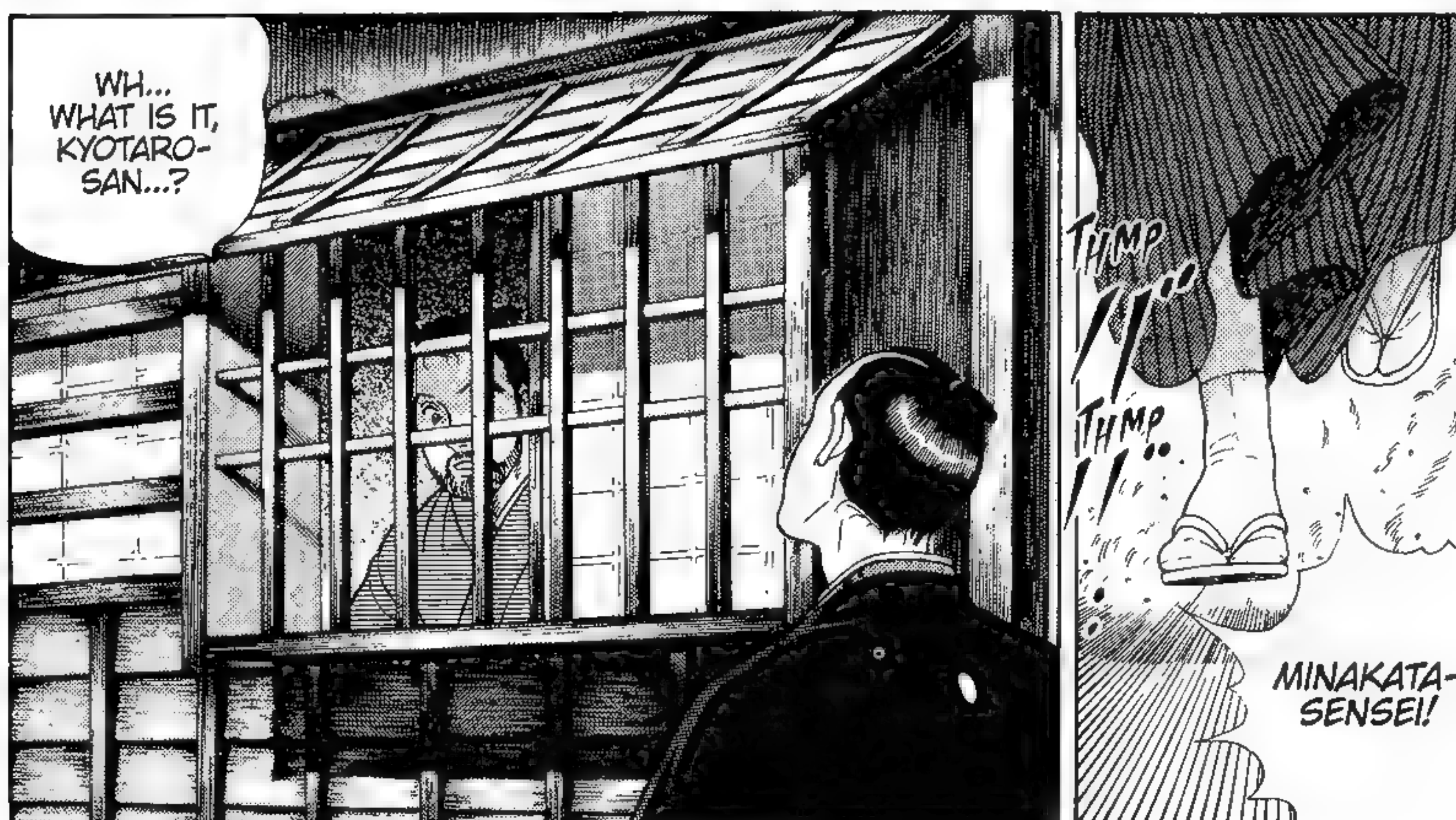
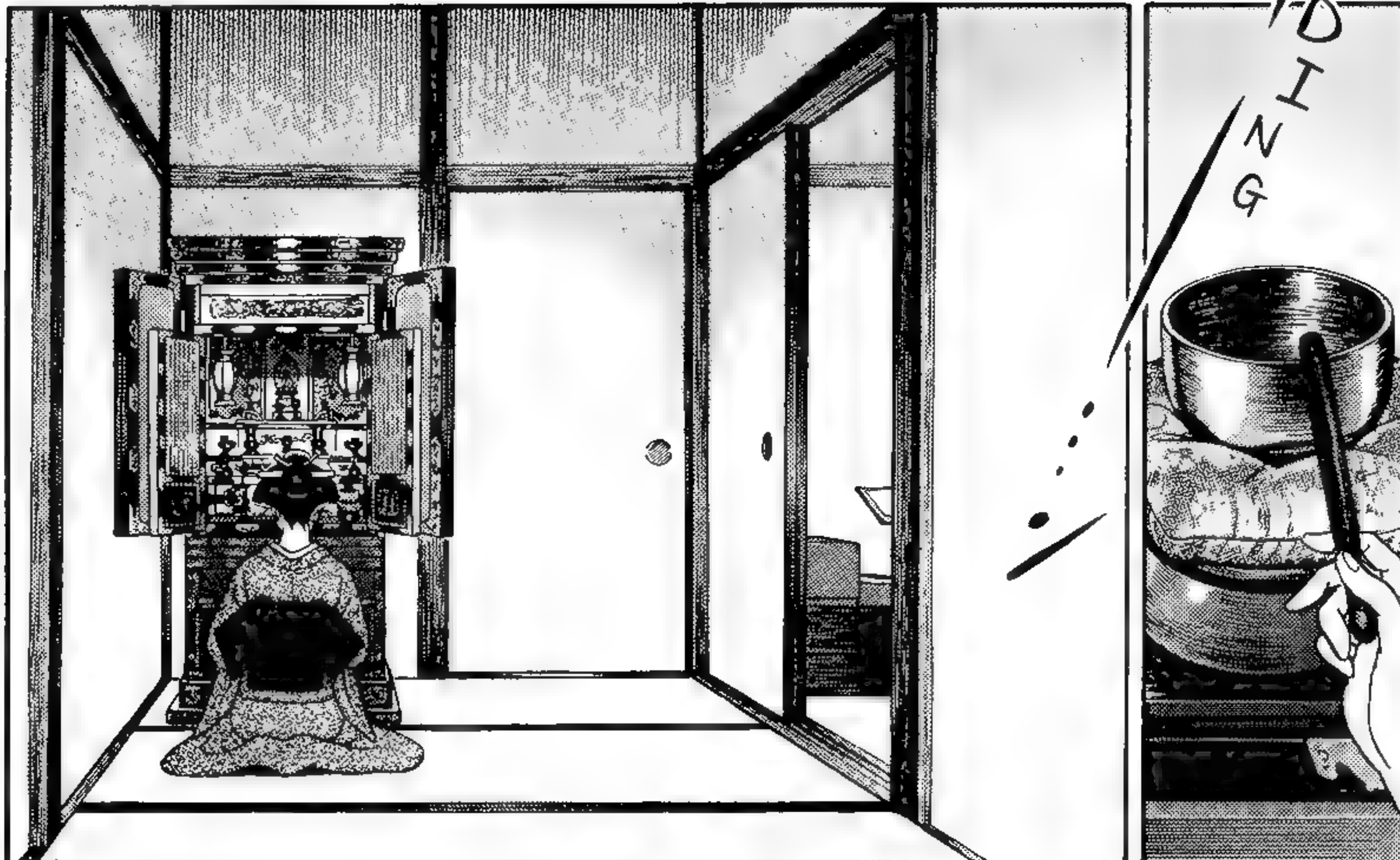




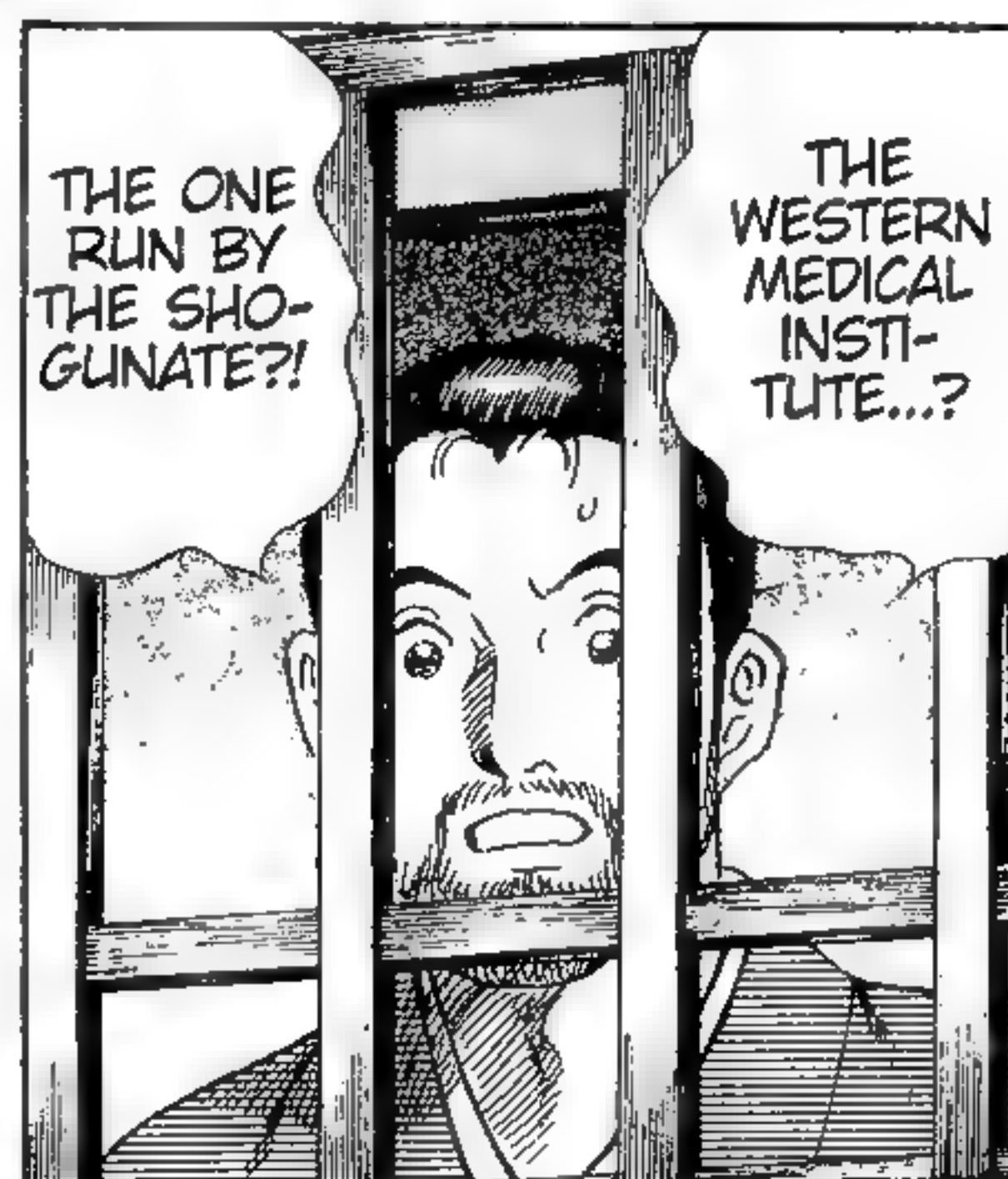














HEAVE  
HO!

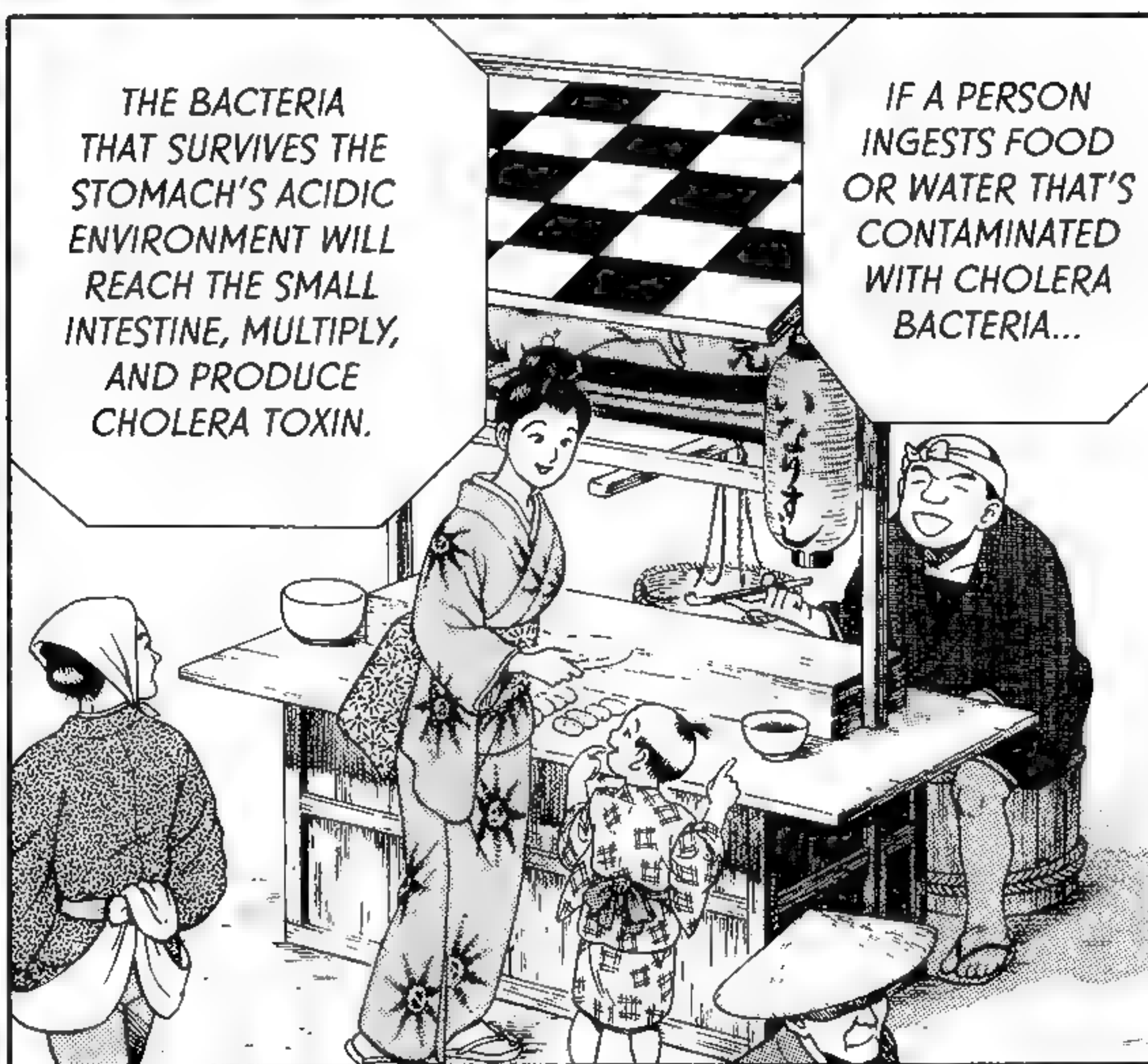
HEAVE  
HO!







NORMALLY,  
THE PERIOD OF  
INCUBATION  
IS LESS THAN  
THREE DAYS...



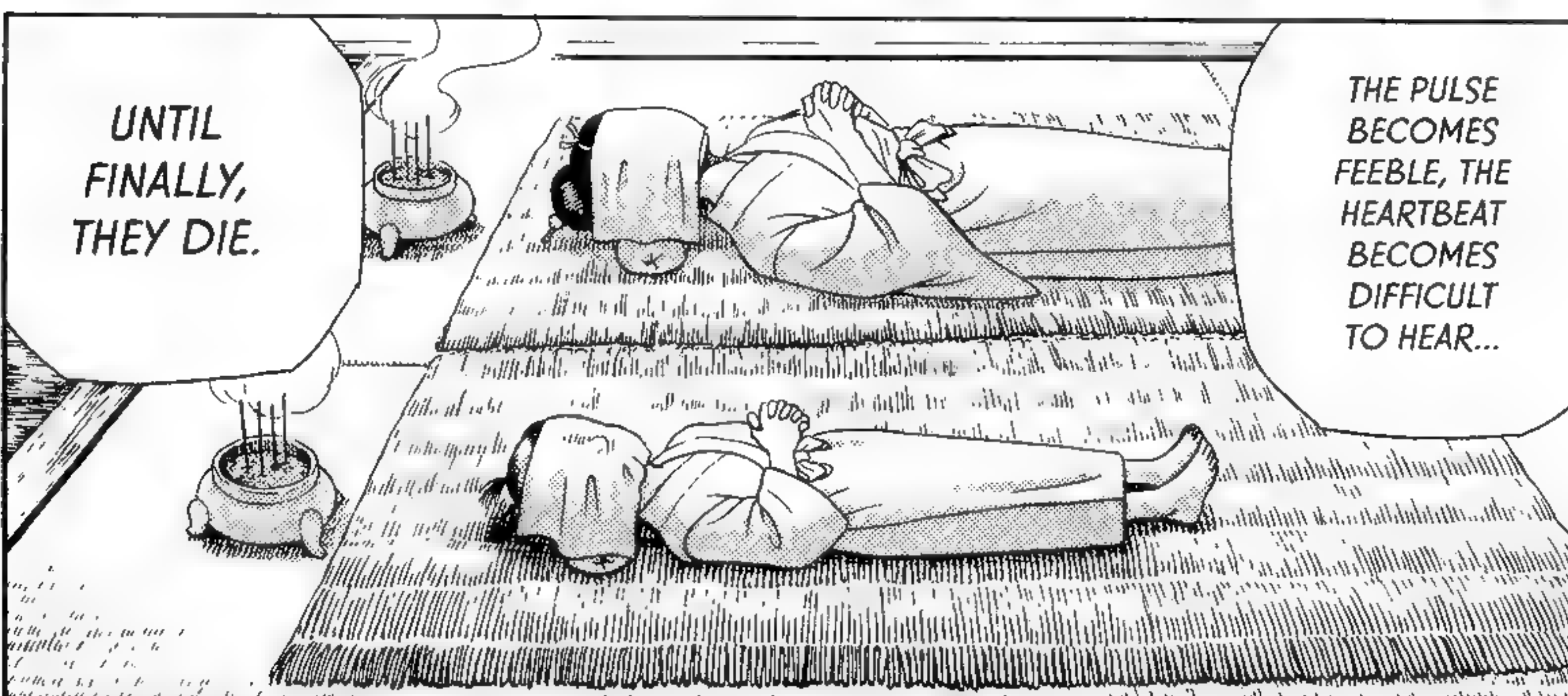
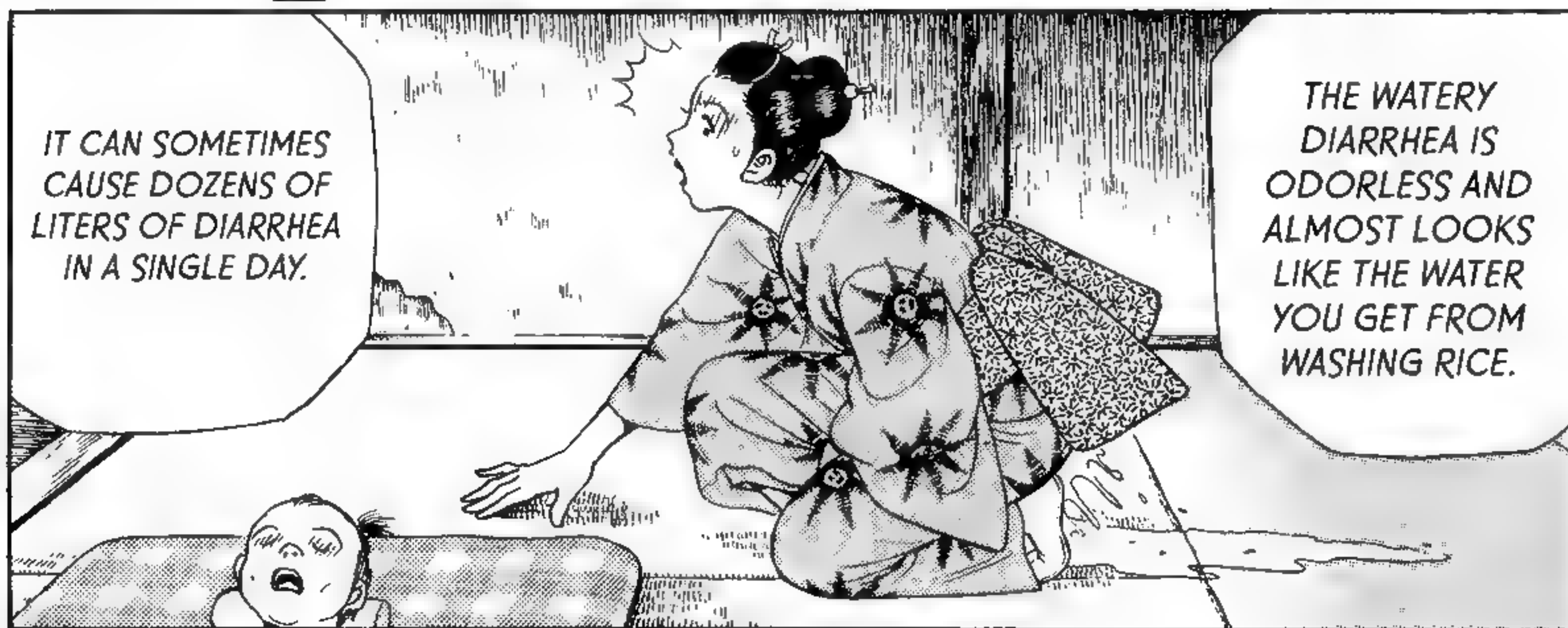
THE BACTERIA  
THAT SURVIVES THE  
STOMACH'S ACIDIC  
ENVIRONMENT WILL  
REACH THE SMALL  
INTESTINE, MULTIPLY,  
AND PRODUCE  
CHOLERA TOXIN.

IF A PERSON  
INGESTS FOOD  
OR WATER THAT'S  
CONTAMINATED  
WITH CHOLERA  
BACTERIA...



THEN IT LEADS TO  
SUDDEN WATERY  
DIARRHEA AND  
VOMITING AS A  
RESULT OF THE  
CHOLERA TOXIN.







HOWEVER,  
EDO IS FAR  
FROM A  
FILTHY CITY.



CHOLERA...  
THERE'S ABOUT TO  
BE AN OUTBREAK OF  
THIS FATAL PLAGUE  
FOR THE PEOPLE IN  
THIS ERA IN EDO.

AND THE PLAGUE  
WILL USE THE  
FEATURES OF THE  
CITY THAT HAVE  
BEEN DEVELOPED  
AS A BREEDING  
GROUND FOR ITS  
ACTIVITIES...



THIS IS A CITY  
WITH OVER ONE  
MILLION PEOPLE,  
AND IT'S BEAUTIFUL  
IN A WAY THAT'S  
UNIMAGINABLE TO  
THOSE LIVING IN  
THE FUTURE.

THE BATTLE  
TO COME ISN'T  
ONE THAT I CAN  
WIN ALONE!



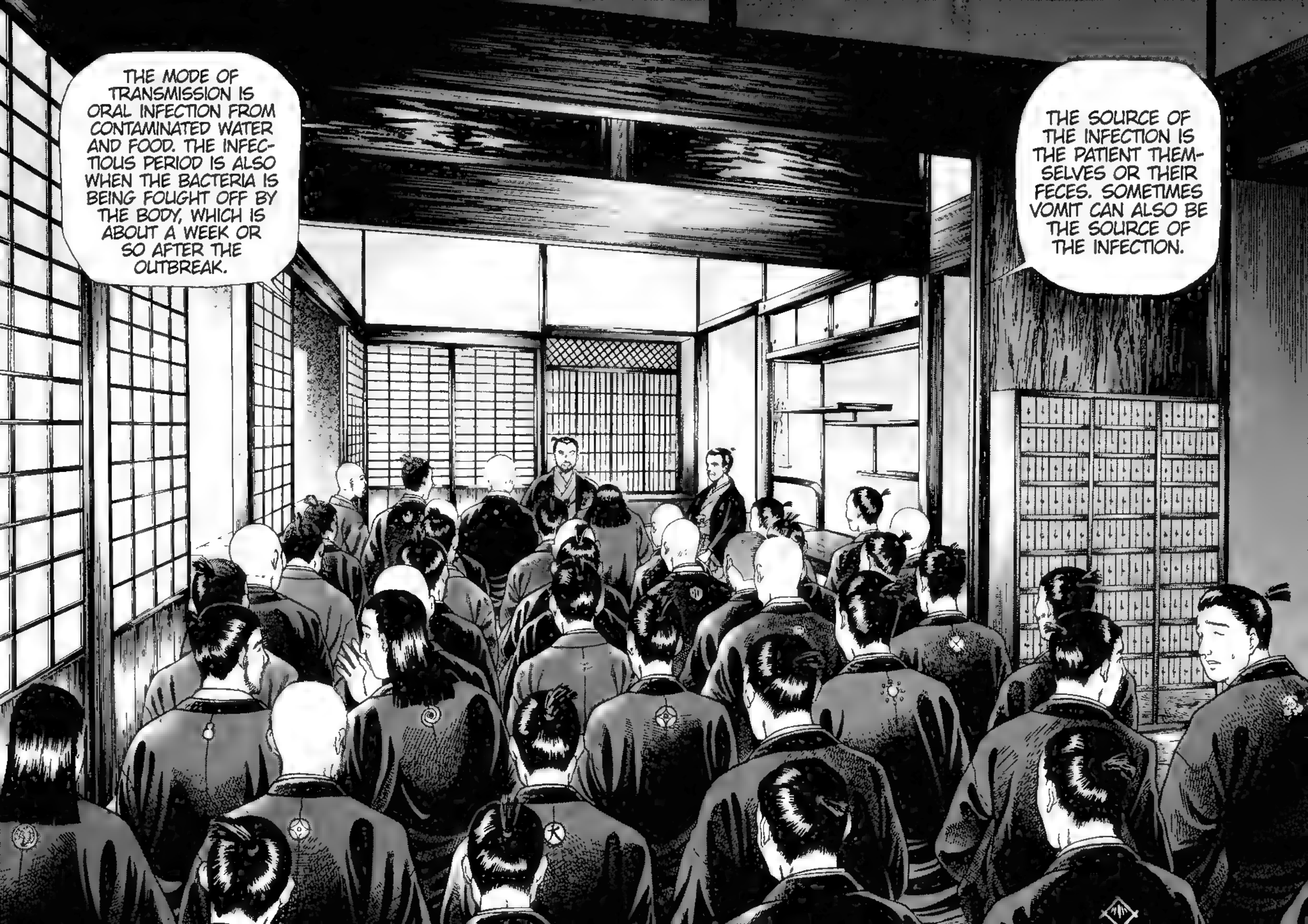




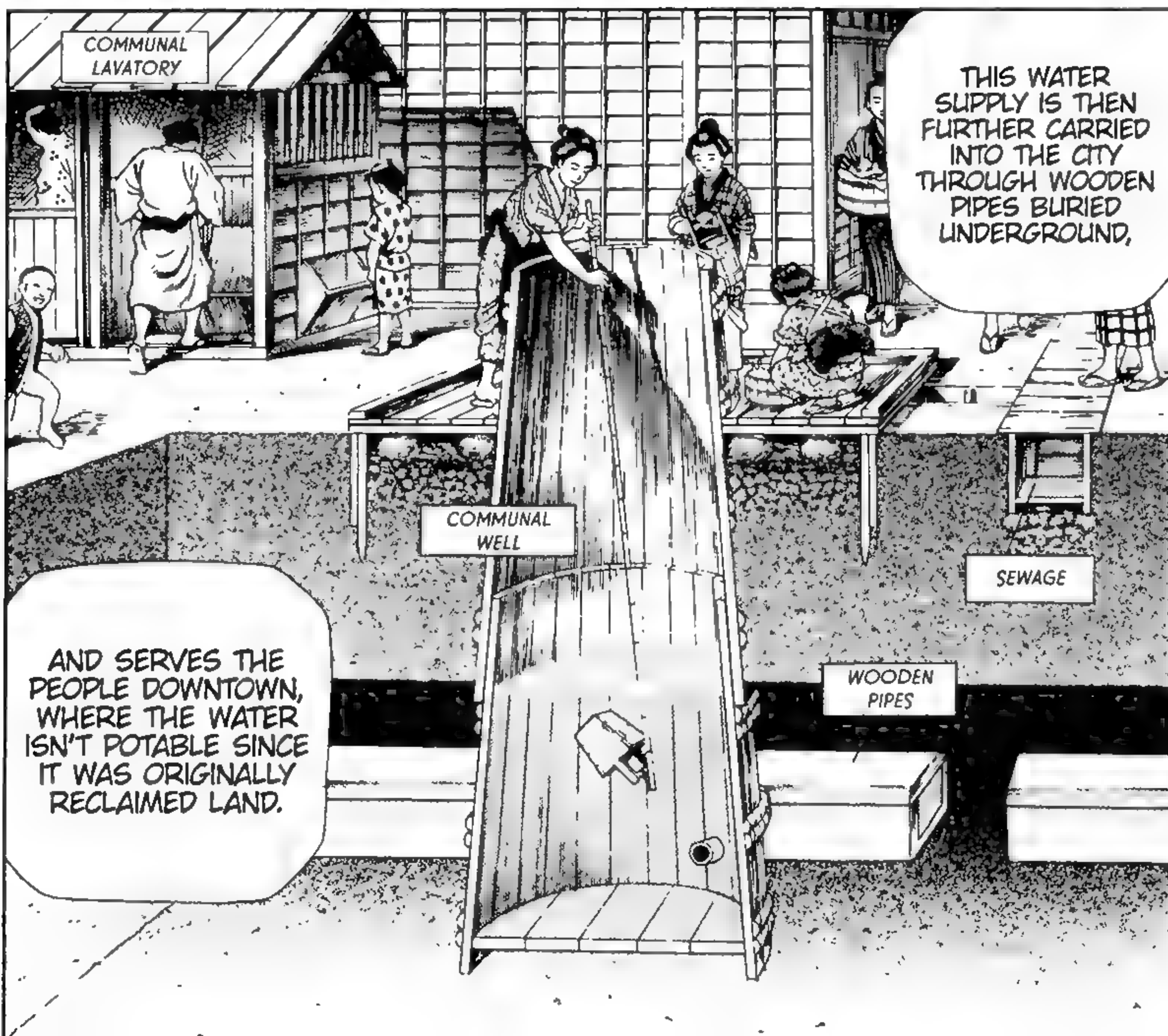
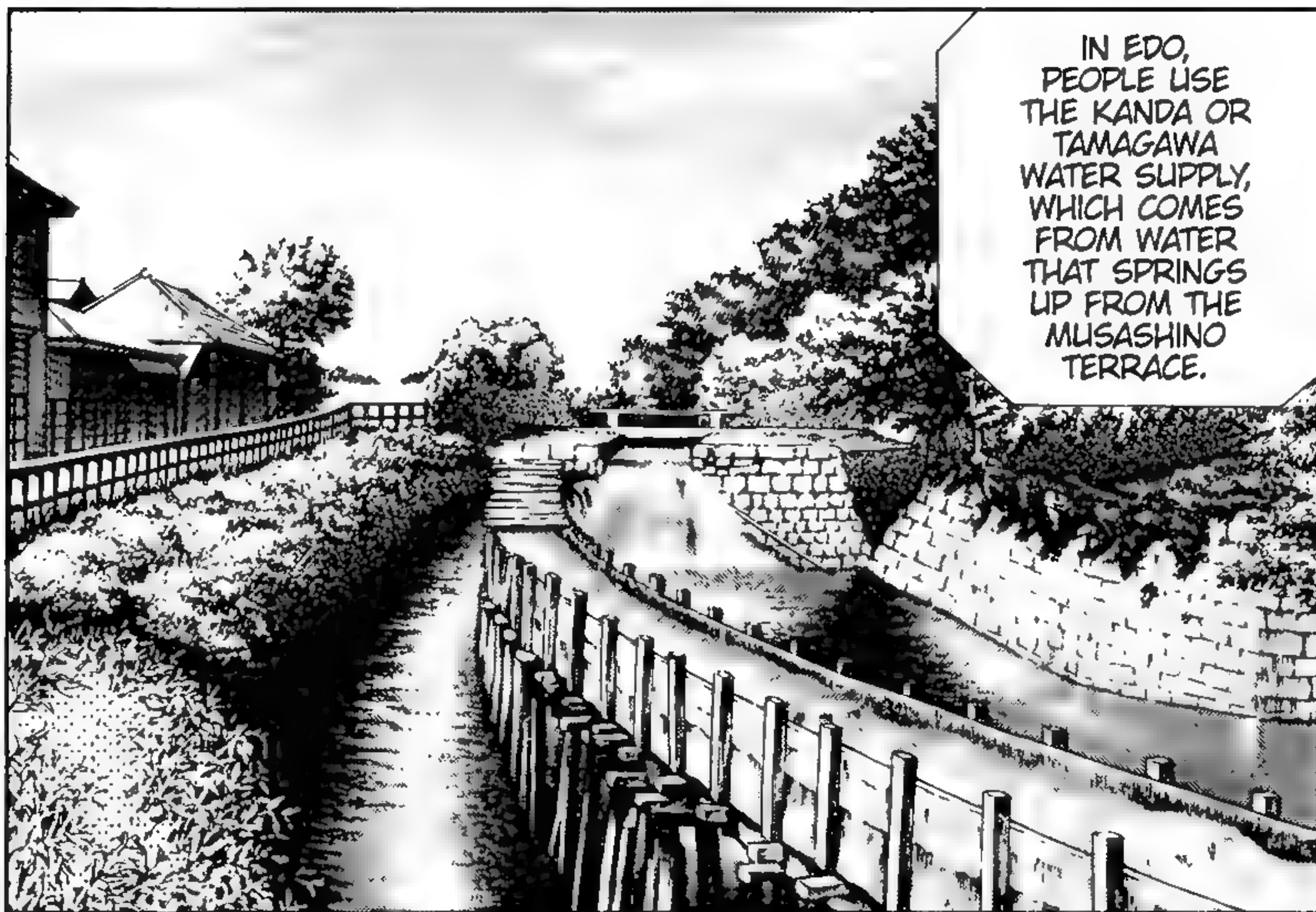


THE MODE OF TRANSMISSION IS ORAL INFECTION FROM CONTAMINATED WATER AND FOOD. THE INFECTIOUS PERIOD IS ALSO WHEN THE BACTERIA IS BEING FOUGHT OFF BY THE BODY, WHICH IS ABOUT A WEEK OR SO AFTER THE OUTBREAK.

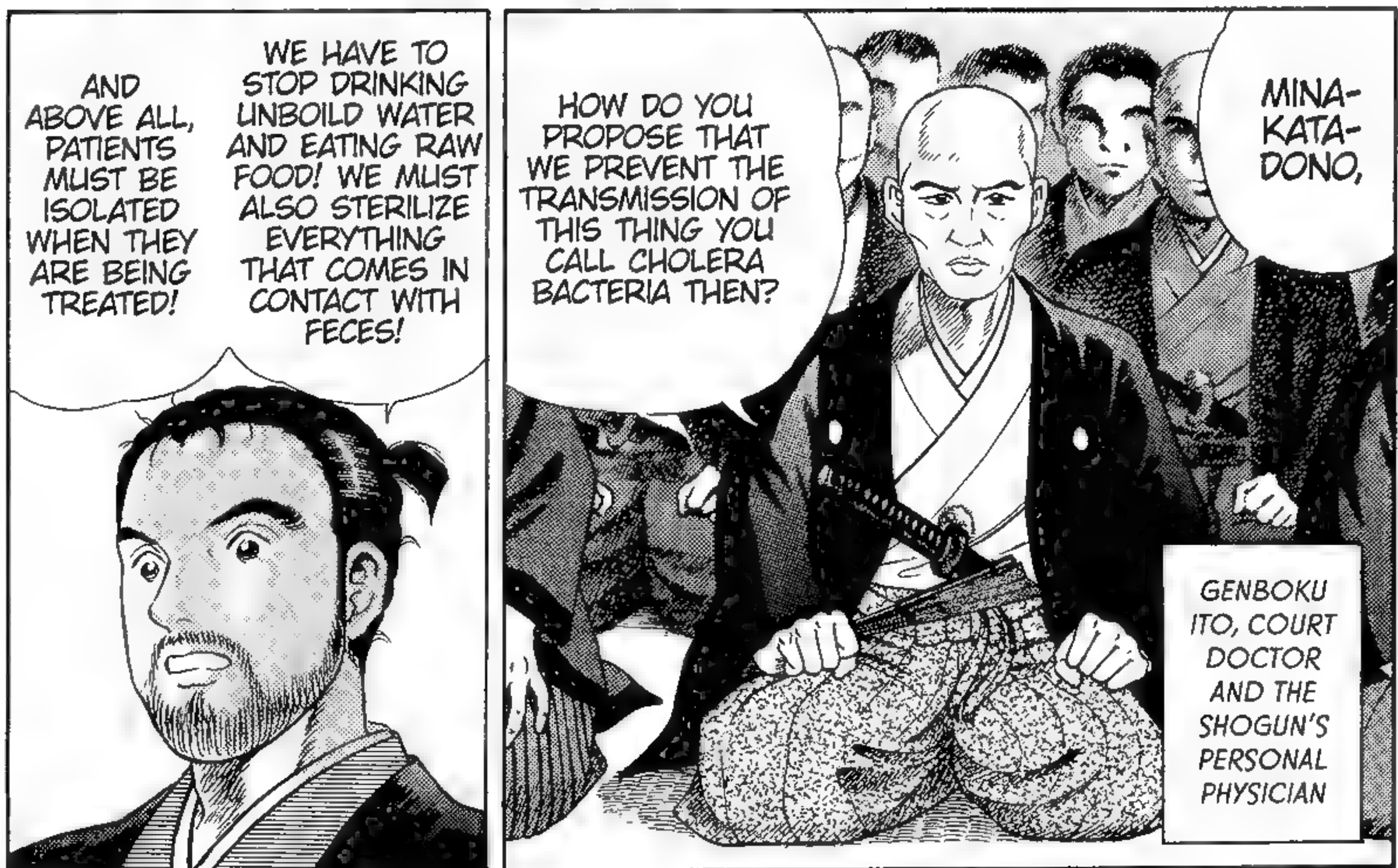
THE SOURCE OF THE INFECTION IS THE PATIENT THEMSELVES OR THEIR FECES. SOMETIMES VOMIT CAN ALSO BE THE SOURCE OF THE INFECTION.
















THEY ALL SAID  
THAT YOUR SUPERB  
SURGICAL TECHNIQUE  
AND EXTRAORDINARY  
MEDICAL KNOWLEDGE  
SURPASS ANYTHING  
CURRENTLY KNOWN.

MINAKATA-DONO,  
I'VE HEARD MUCH  
ABOUT YOU NOT ONLY  
FROM KATSU-SAMA,  
BUT ALSO FROM  
DR. HEPBURN AND  
DR. WILLIS IN  
YOKOHAMA.

DIRECTOR OF THE  
WESTERN MEDICAL  
INSTITUTE (HEAD  
PHYSICIAN IN THE  
SHOGUNATE)

**KOAN  
OGATA**



HOW CAN  
CHOLERA BE  
TREATED?

IF THAT  
IS TRUE...  
I WOULD  
VERY MUCH  
LIKE YOU TO  
ANSWER  
THIS!









INSIDE THIS BOTTLE IS A LIQUID AGENT THAT I'VE DEVISED TO BE TAKEN ORALLY.

NOT JUST REGULAR WATER!



YOU HAVE TO PRODUCE A LARGE AMOUNT OF THIS AND MAKE YOUR PATIENTS DRINK IT PERSISTENTLY.

IT'S WATER MIXED WITH A CERTAIN PROPORTION OF BROWN SUGAR AND SALT, AND THEN BOILED ONCE.



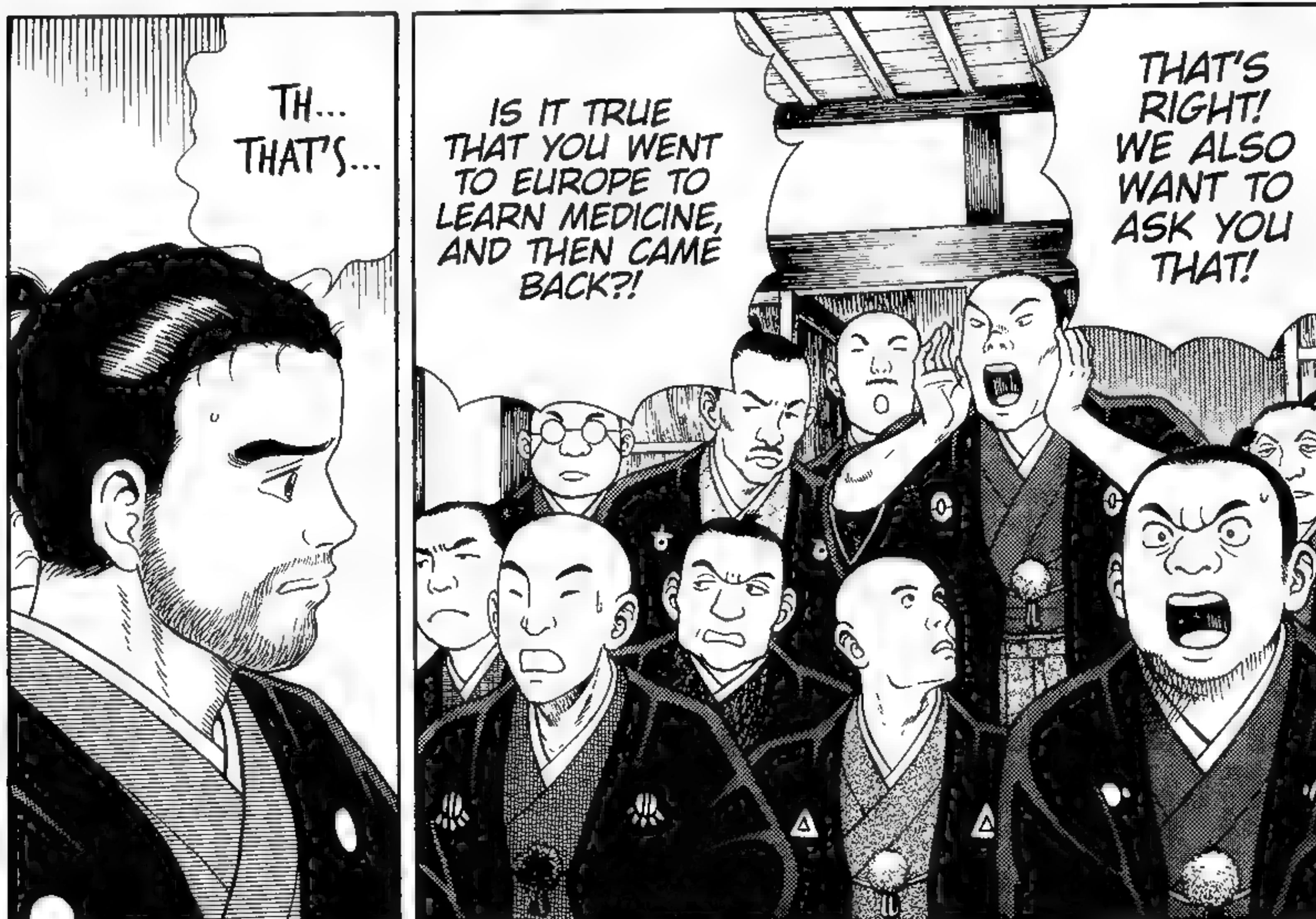
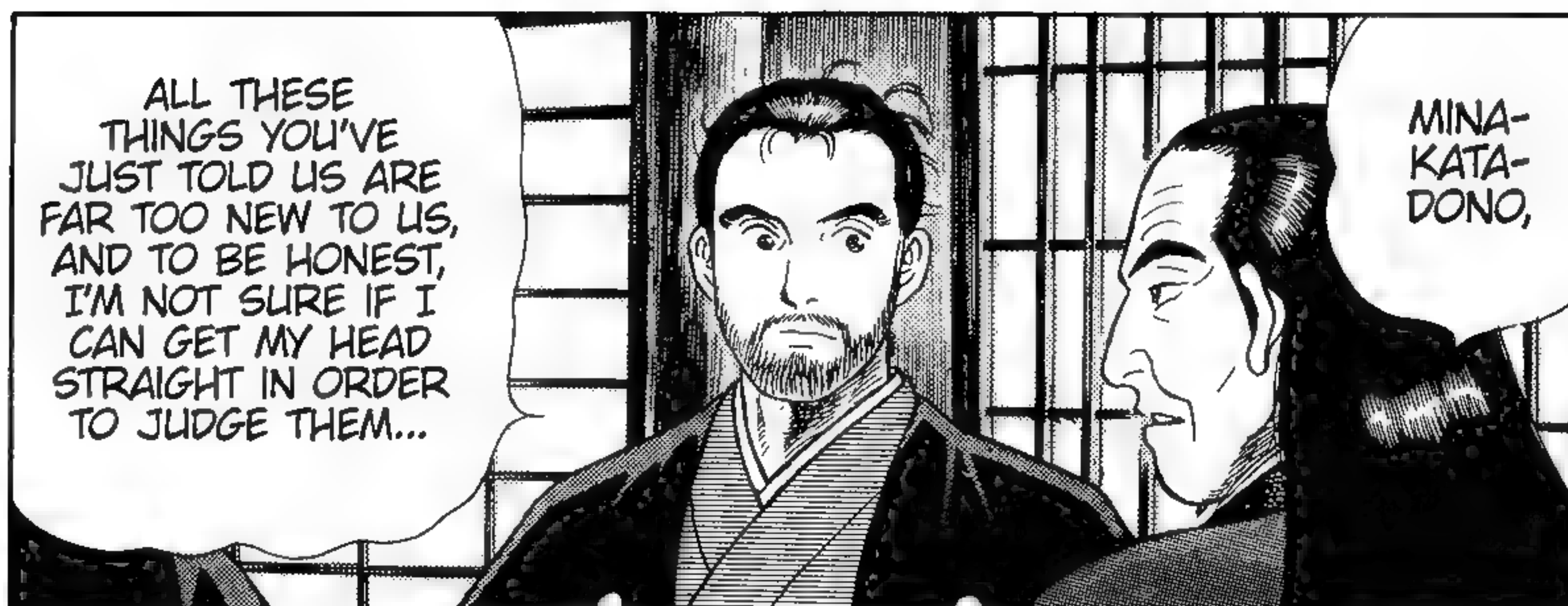
THIS IS TO BE INJECTED DIRECTLY INTO THE PATIENT'S BLOOD STREAM WITH THESE TOOLS HERE.

AND NEXT IS... THIS LIQUID HERE, SALINE, WHICH IS DISTILLED WATER MIXED WITH SALT THAT'S THEN BOILED.

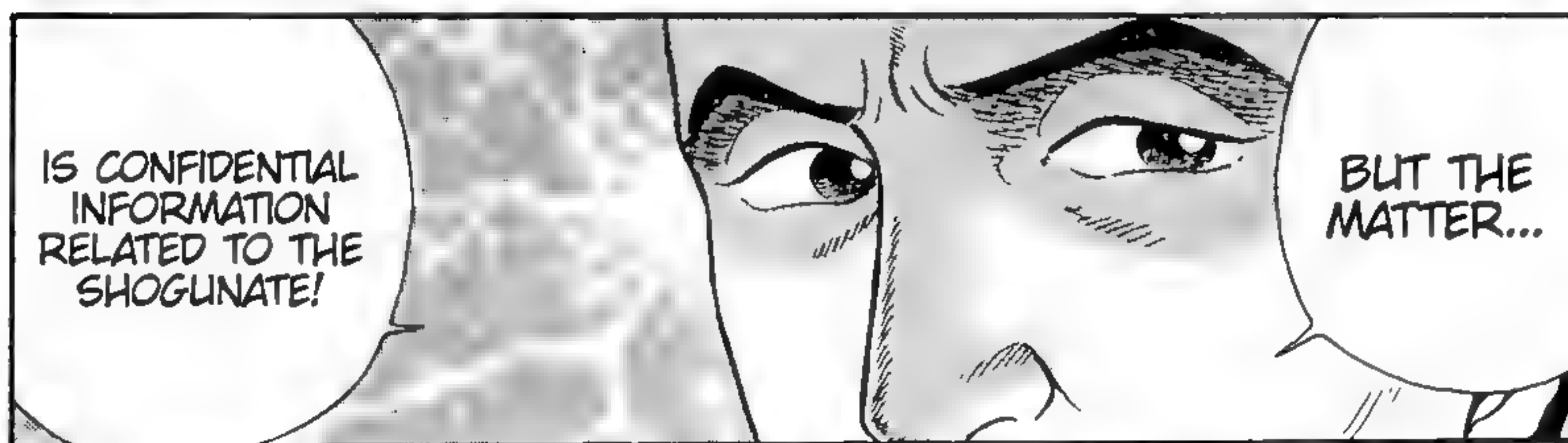














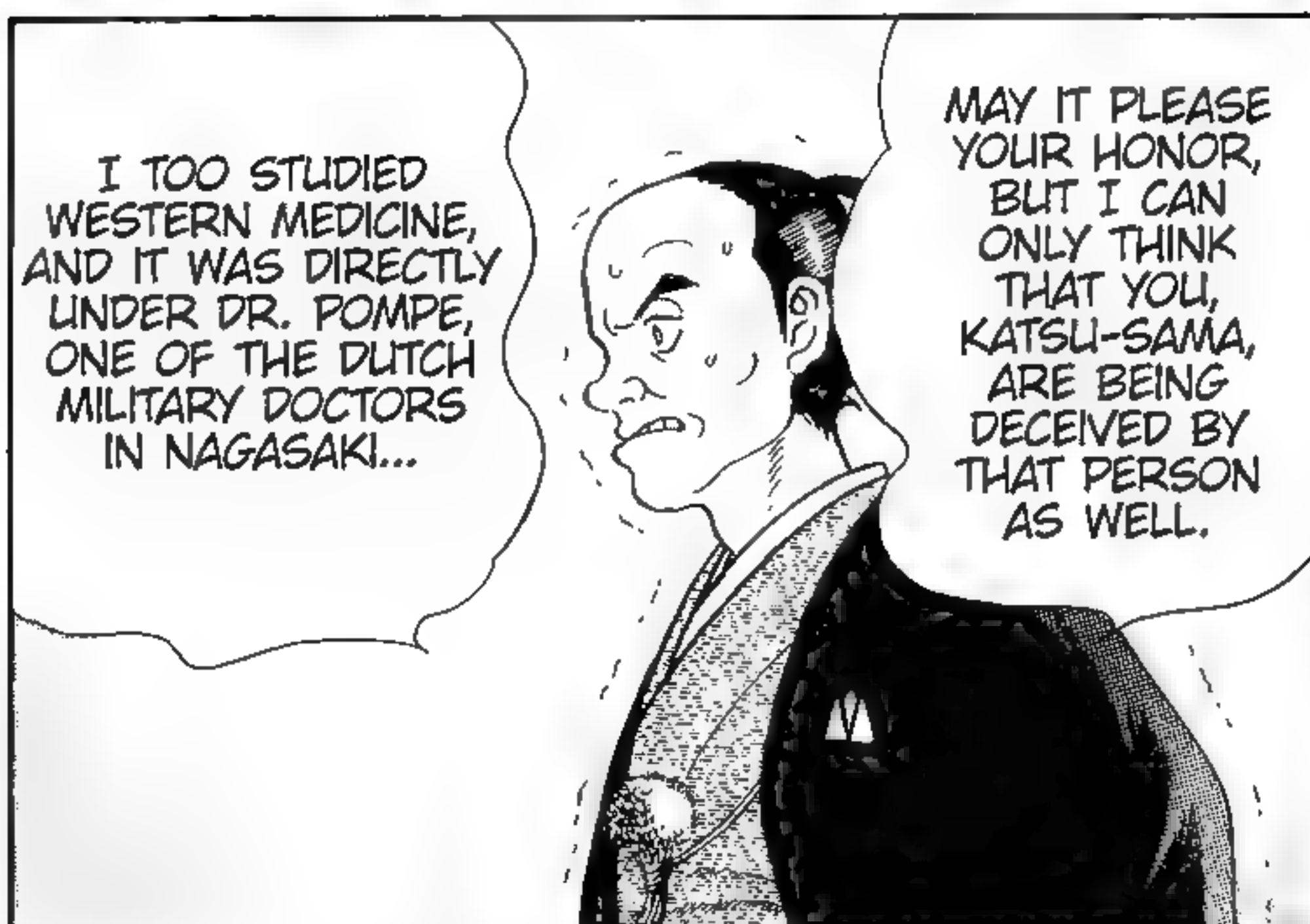


YAMADA-SENSEI?!



ALL OF YOU, THINK ABOUT THIS CAREFULLY! DON'T LET HIM DECEIVE YOU!

NO WAY! I'M NOT CONVINCED!



I TOO STUDIED WESTERN MEDICINE, AND IT WAS DIRECTLY UNDER DR. POMPE, ONE OF THE DUTCH MILITARY DOCTORS IN NAGASAKI...

MAY IT PLEASE YOUR HONOR, BUT I CAN ONLY THINK THAT YOU, KATSU-SAMA, ARE BEING DECEIVED BY THAT PERSON AS WELL.



YOU THERE, ARE YOU TRYING TO SAY THAT I, RINTARO KATSU, CURRENT VICE MAGISTRATE OF NAVAL AFFAIRS\*, AM A LIAR?!

\*HE WAS PROMOTED TO VICE MAGISTRATE OF NAVAL AFFAIRS IN AUGUST THAT YEAR.

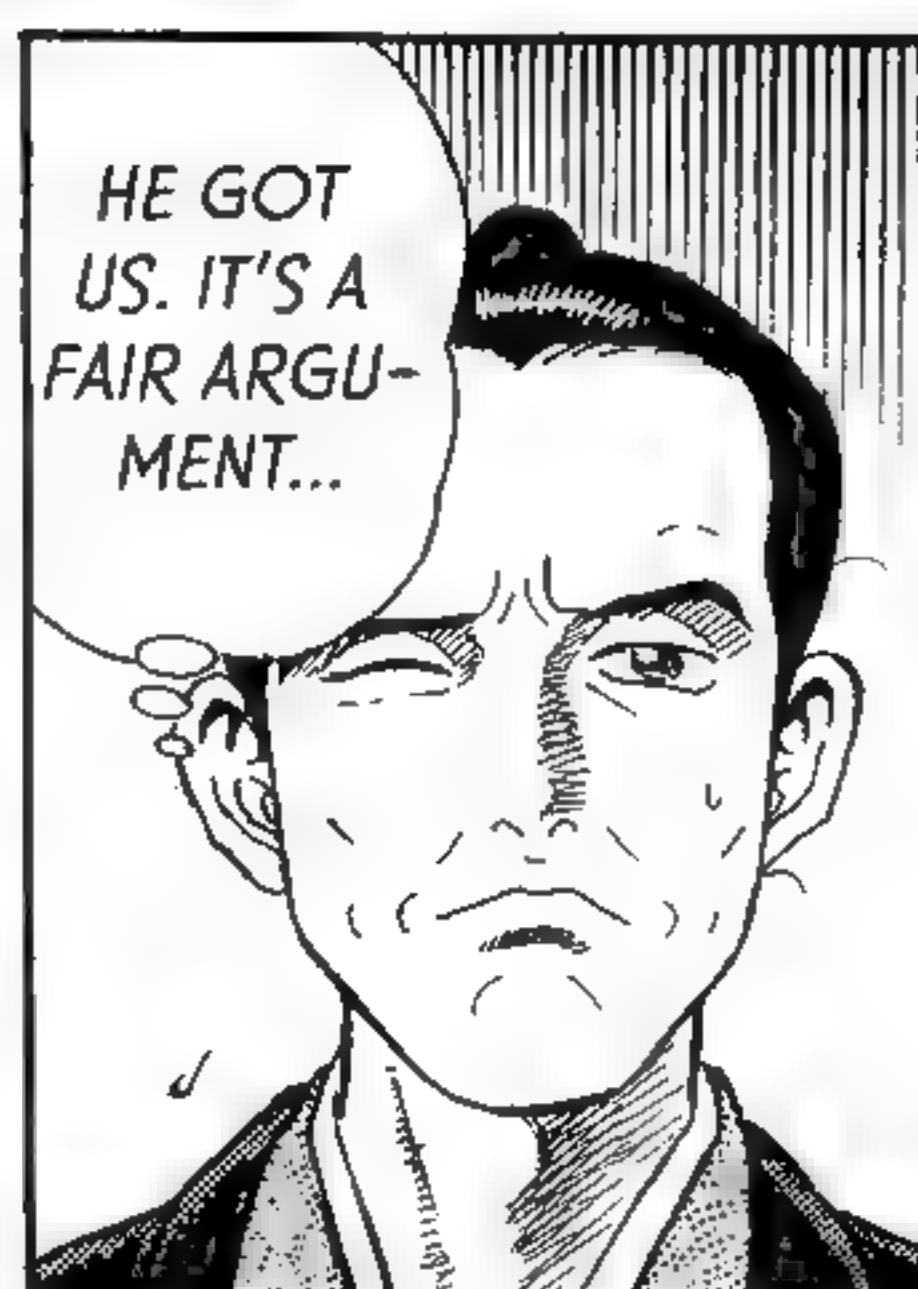
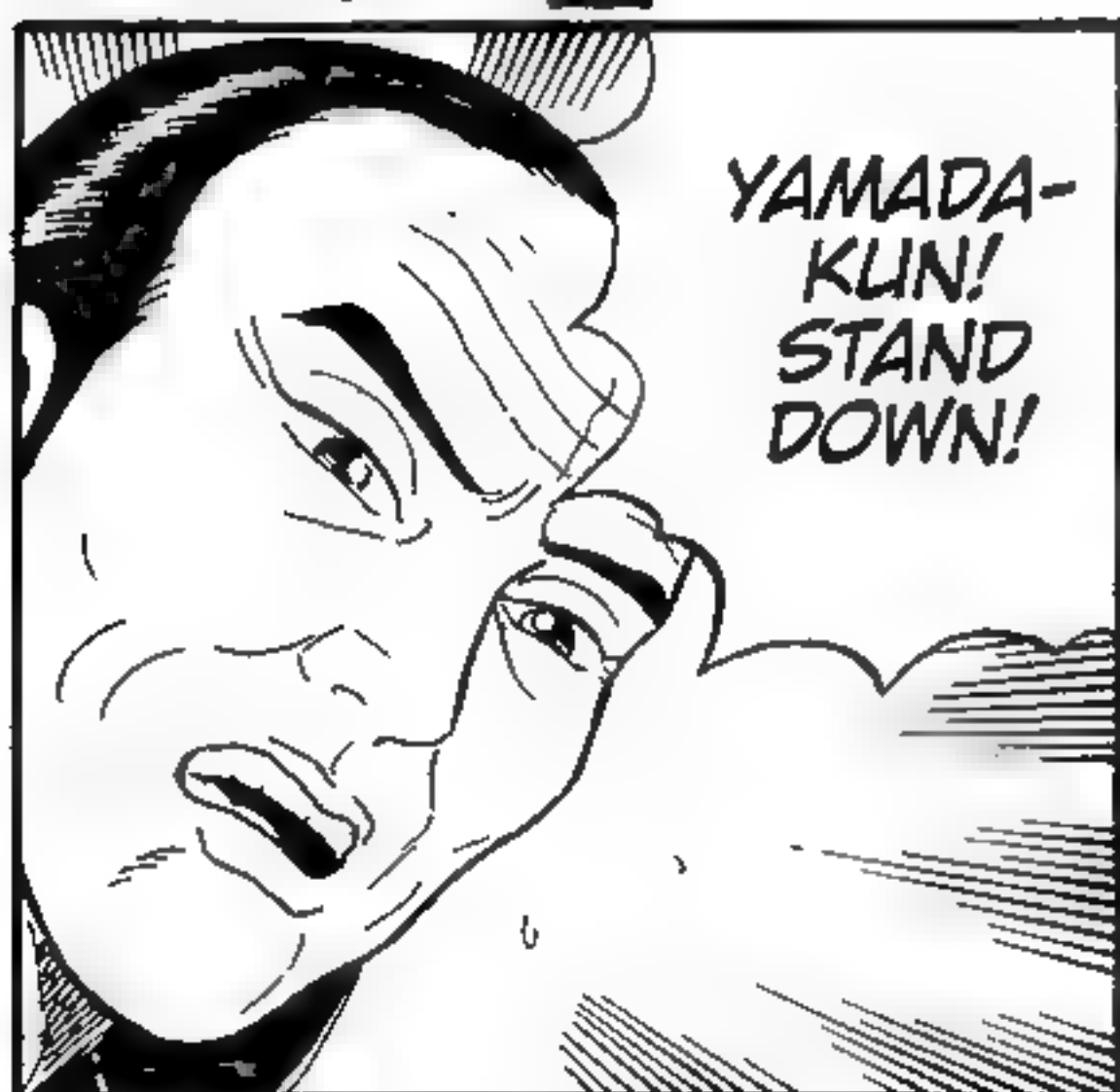


BUT HE NEVER TAUGHT ME A METHOD AS RIDICULOUS AS THE ONE I JUST HEARD!

DR. POMPE WASN'T ONE OF THOSE MISSIONARY DOCTORS IN YOKOHAMA. HE WAS IN POSSESSION OF THE LATEST IN WESTERN MEDICAL KNOWLEDGE.

POMPE VAN MEERDERVOORT





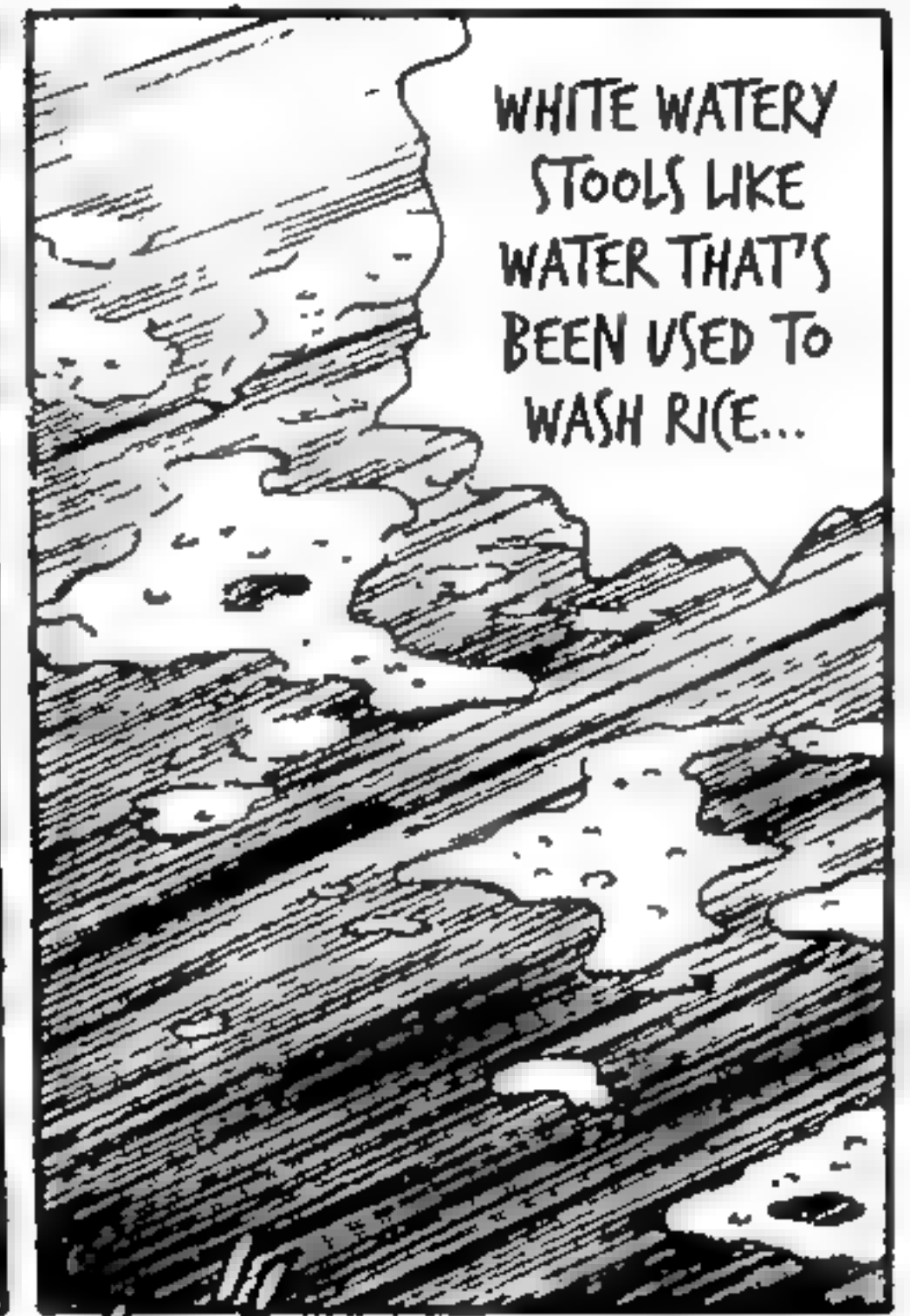


















ONCE A CASE  
OF CHOLERA  
HAS OCCURED,  
WE MUST ISOLATE  
THE PATIENT TO  
STOP FURTHER  
CONTAGION!

CALM  
DOWN,  
EVERY-  
ONE!



OF COURSE  
SINCE I WAS  
EXPOSED TO  
THE VOMIT,  
I MUST BE  
IMMEDIATELY  
DISINFECTED  
AS WELL!

ANY SURFACE THAT'S  
BEEN CONTAMINATED BY  
THE FECES OF THE PATIENT  
MUST BE STERILIZED RIGHT  
AWAY WITH HIGH CONCENTRATION  
SHOCHU, INCINERATED,  
OR SPRINKLED WITH  
QUICKLIME POWDER.

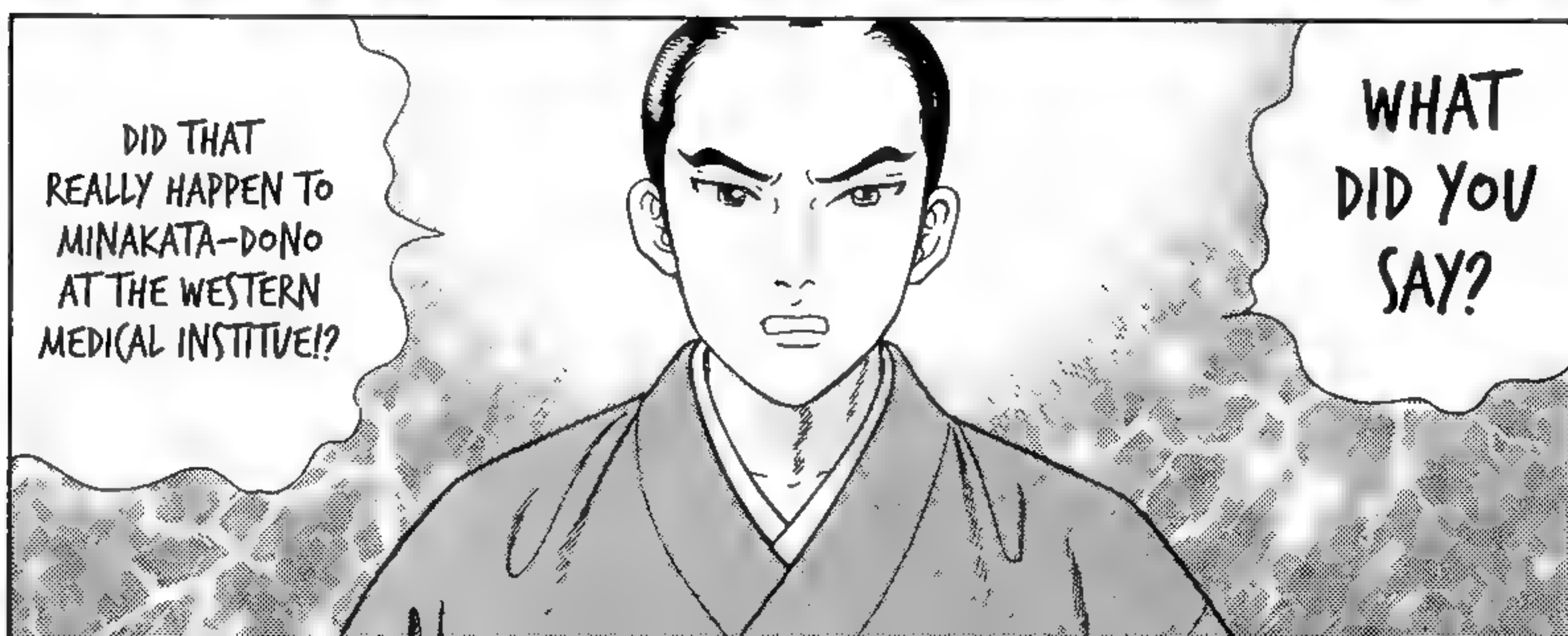








## HUMAN CHAPTER PART 4: CHOLERA VERSUS JIN







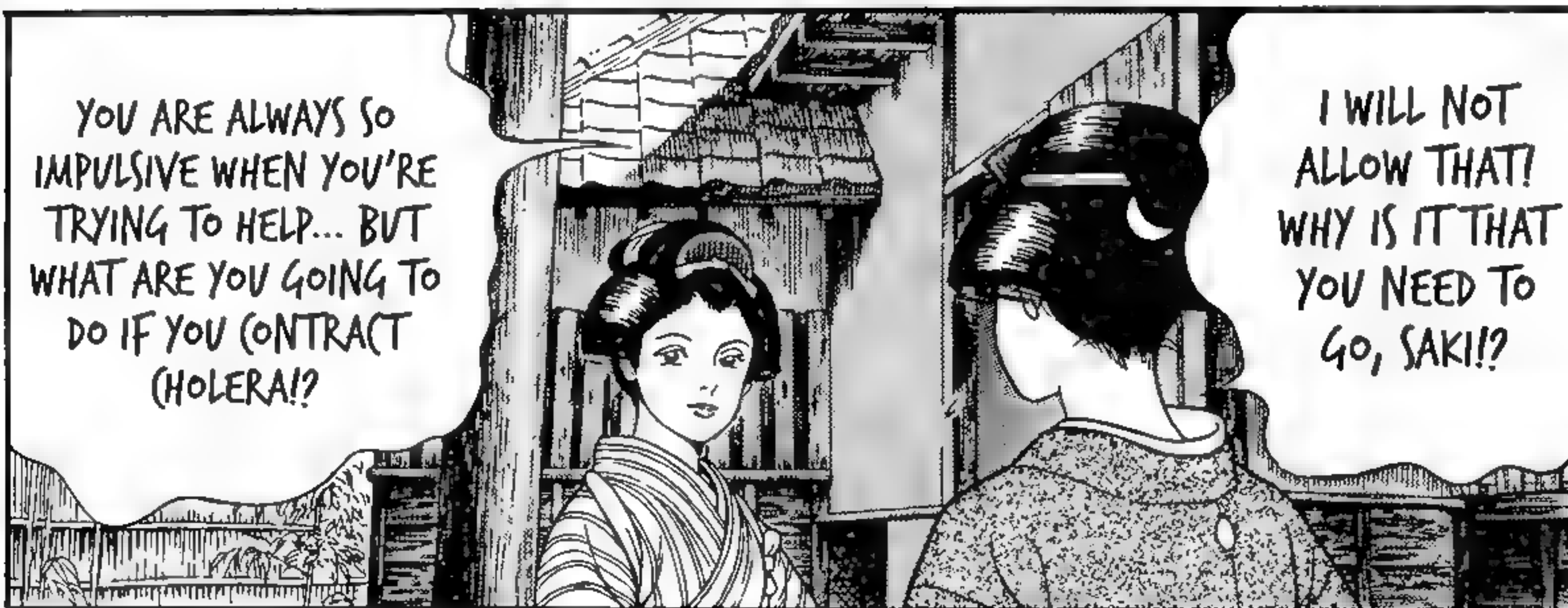
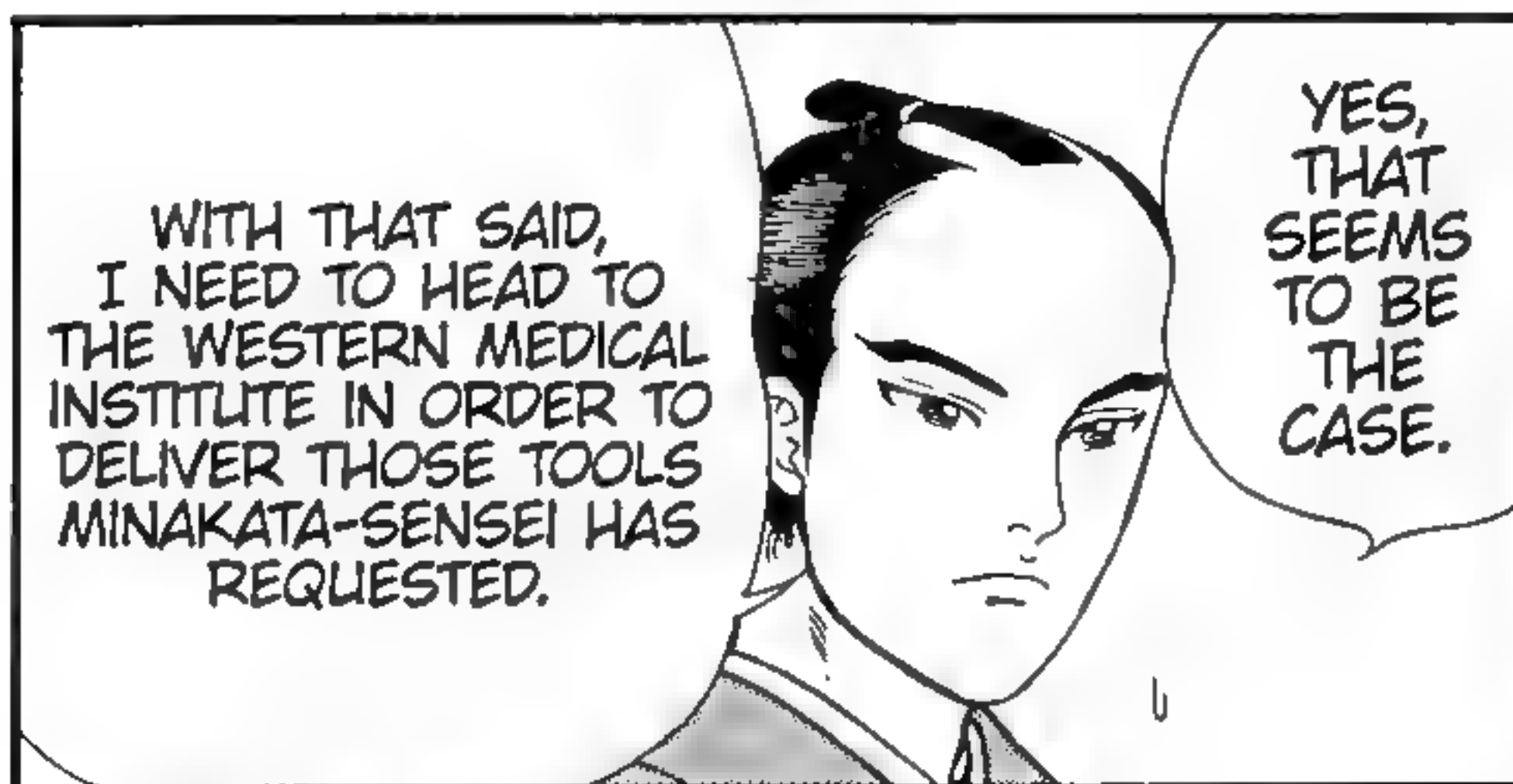
# HUMAN CHAPTER

## PART 4: CHOLERA VERSUS JIN

I'VE BEEN TOLD  
MINAKATA-GENSEI  
ISOLATED HIMSELF  
WITH THE DOCTOR  
IN A PART OF THE  
INSTITUTE AND IS  
TREATING HIM  
PERSONALLY.

OF ALL THE  
PLACES POSSIBLE,  
ONE OF THE DUTCH  
MEDICINE DOCTORS  
CAME DOWN WITH  
CHOLERA AT THE  
WESTERN MEDICAL  
INSTITUTE!





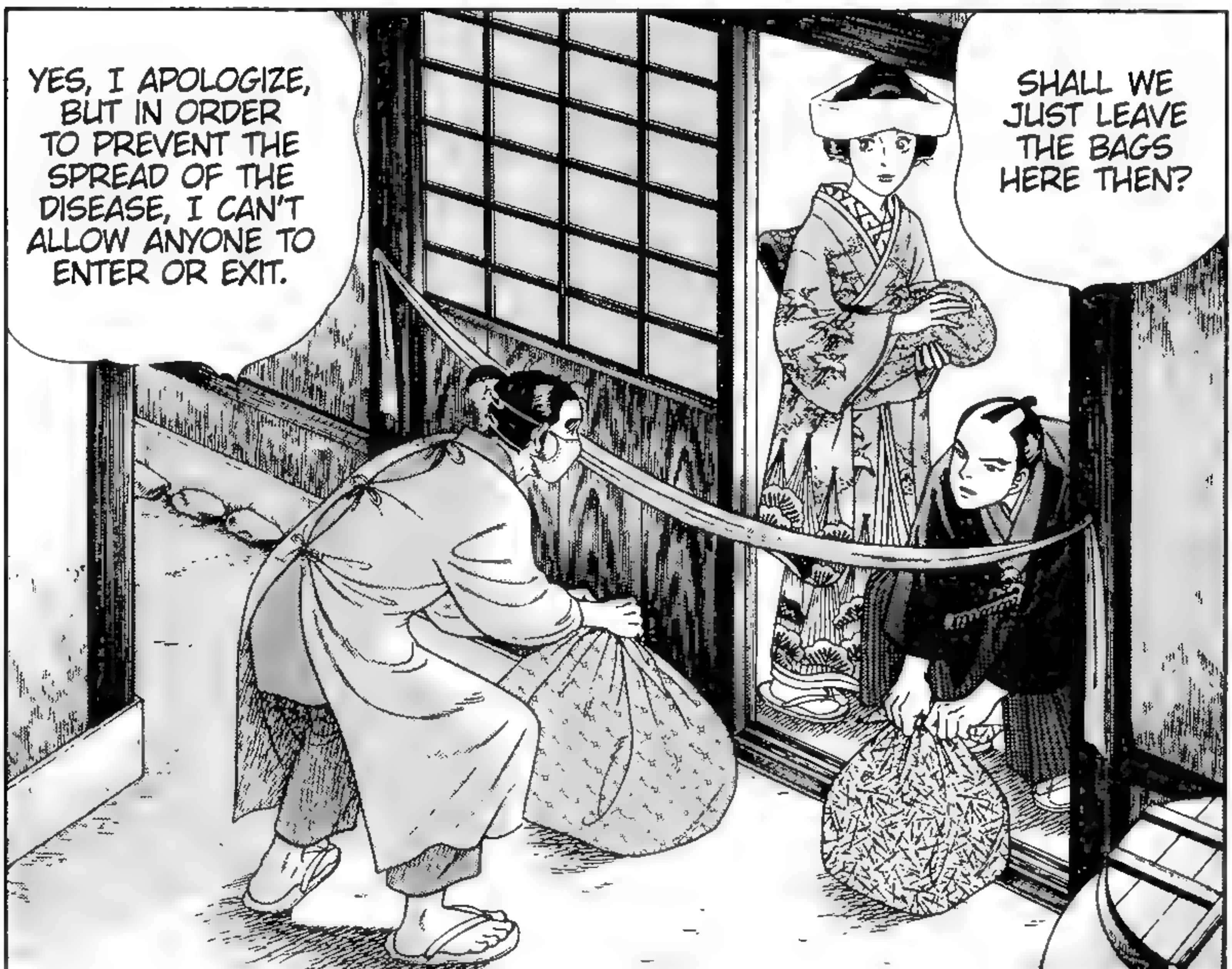
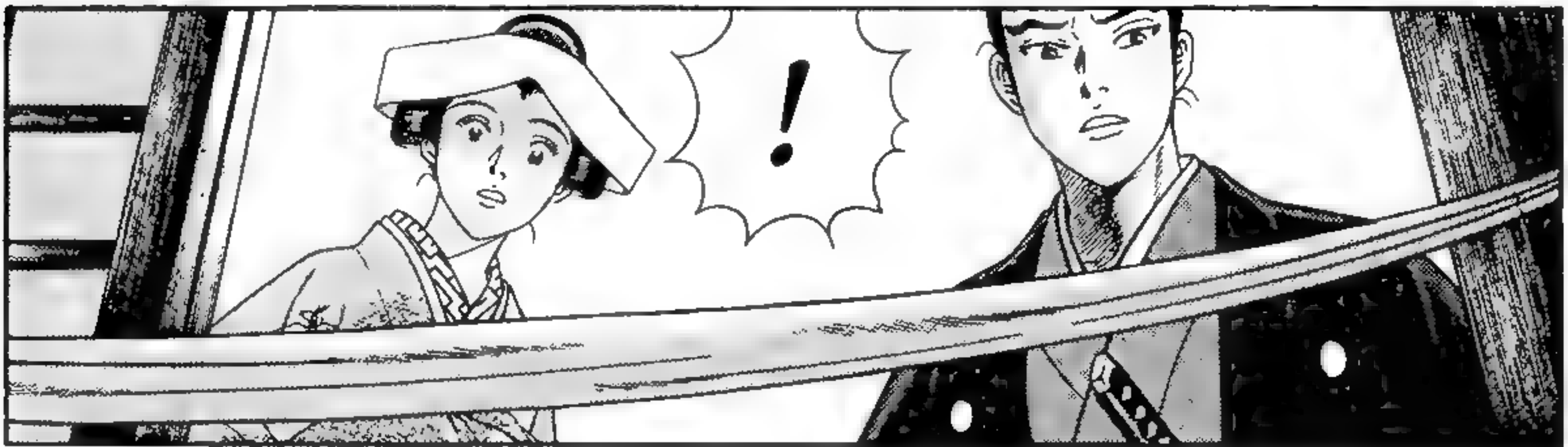














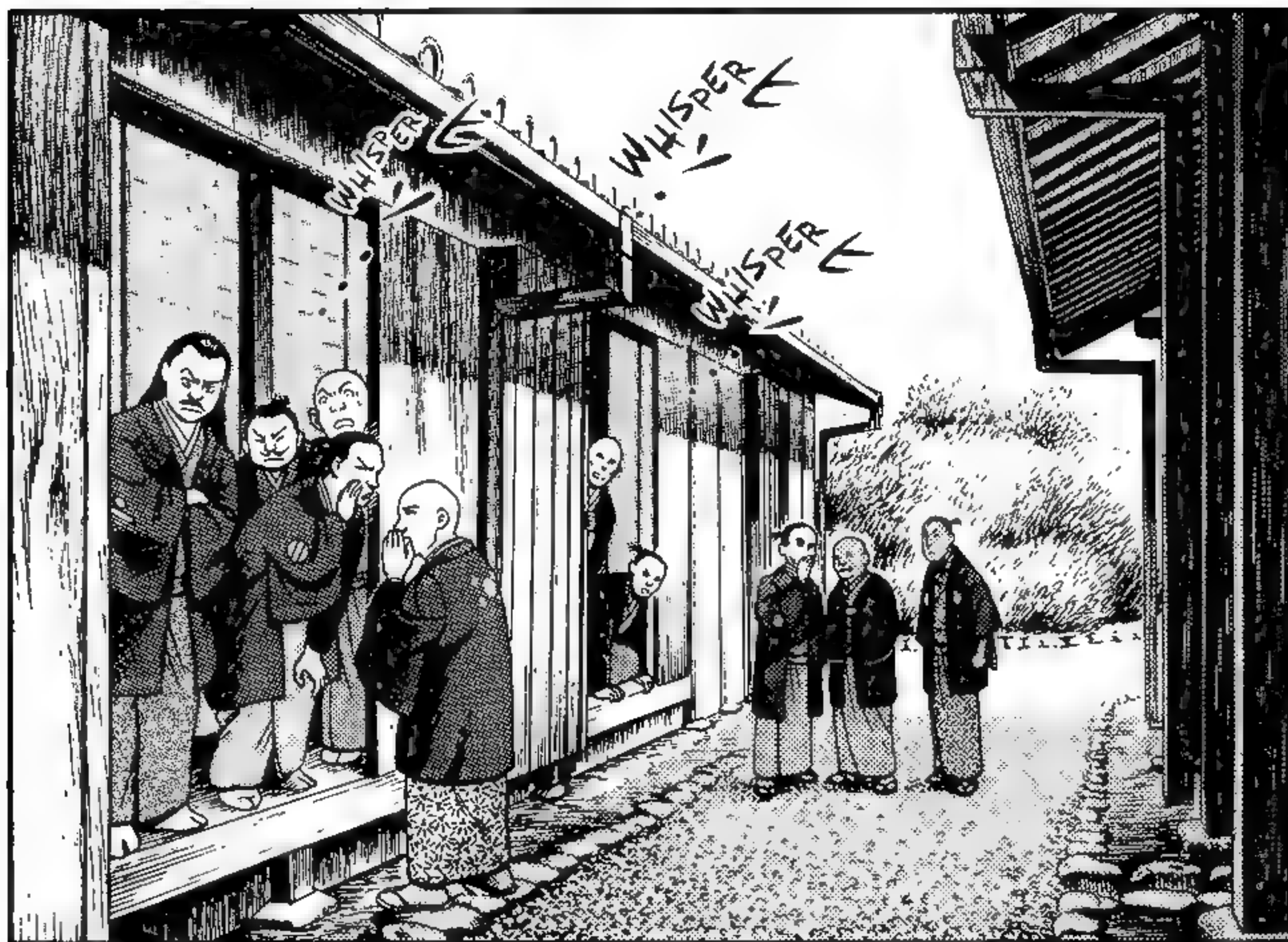
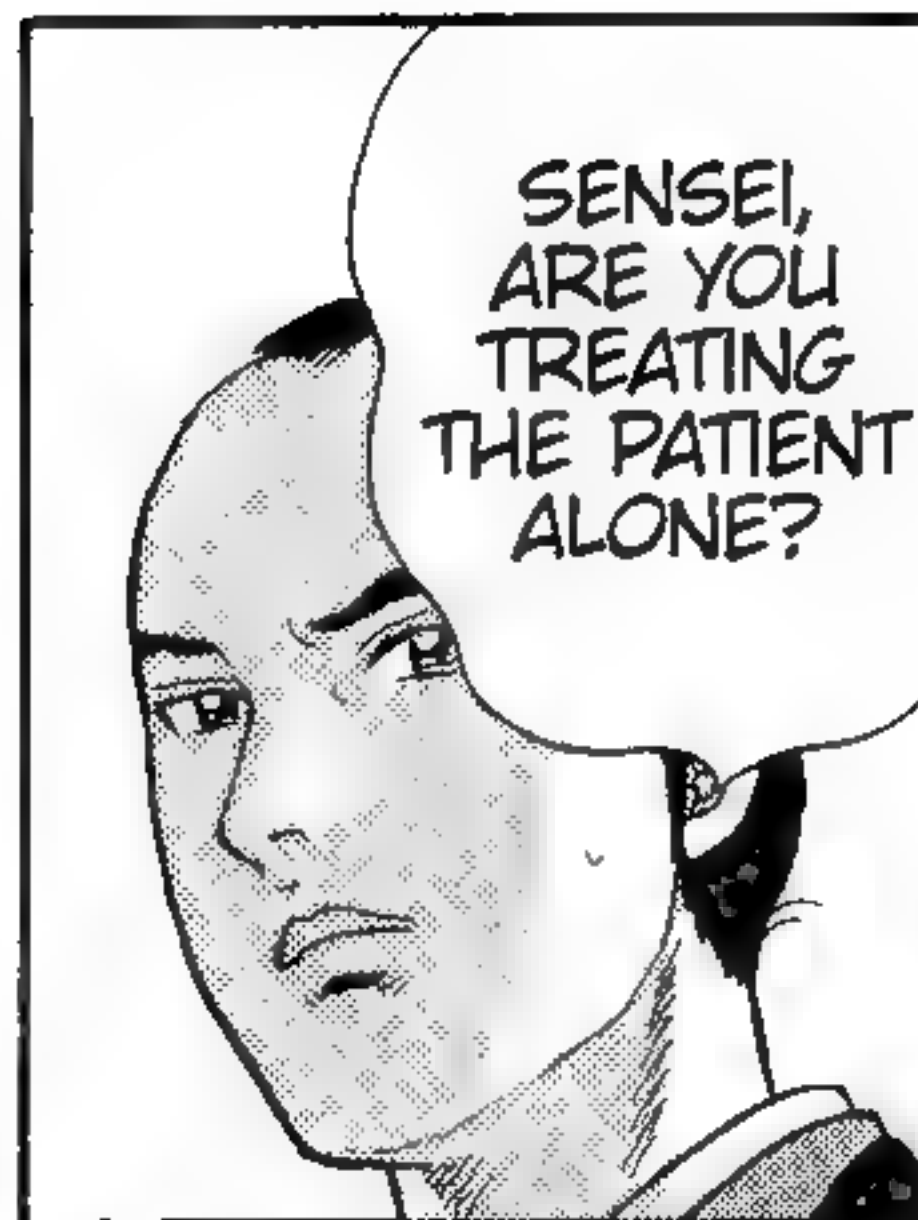


I'VE MADE IT  
SO THAT I CAN  
TAKE CARE OF  
THE PATIENT  
DAY OR NIGHT  
IN THE ROOM  
NEXT DOOR.



IN THIS ANTEROOM,  
I'VE BEEN INCINERATING  
OR STERILIZING ANYTHING  
THAT THE PATIENT OR I  
HAVE USED AND MAKING  
SURE ANYTHING THAT MAY  
HAVE BEEN INFECTED  
DOESN'T GET OUT.









THAT MEANS  
I CAN'T READILY  
LEAVE ANYMORE.  
ISN'T THAT RIGHT,  
MINAKATA-SENSEI?

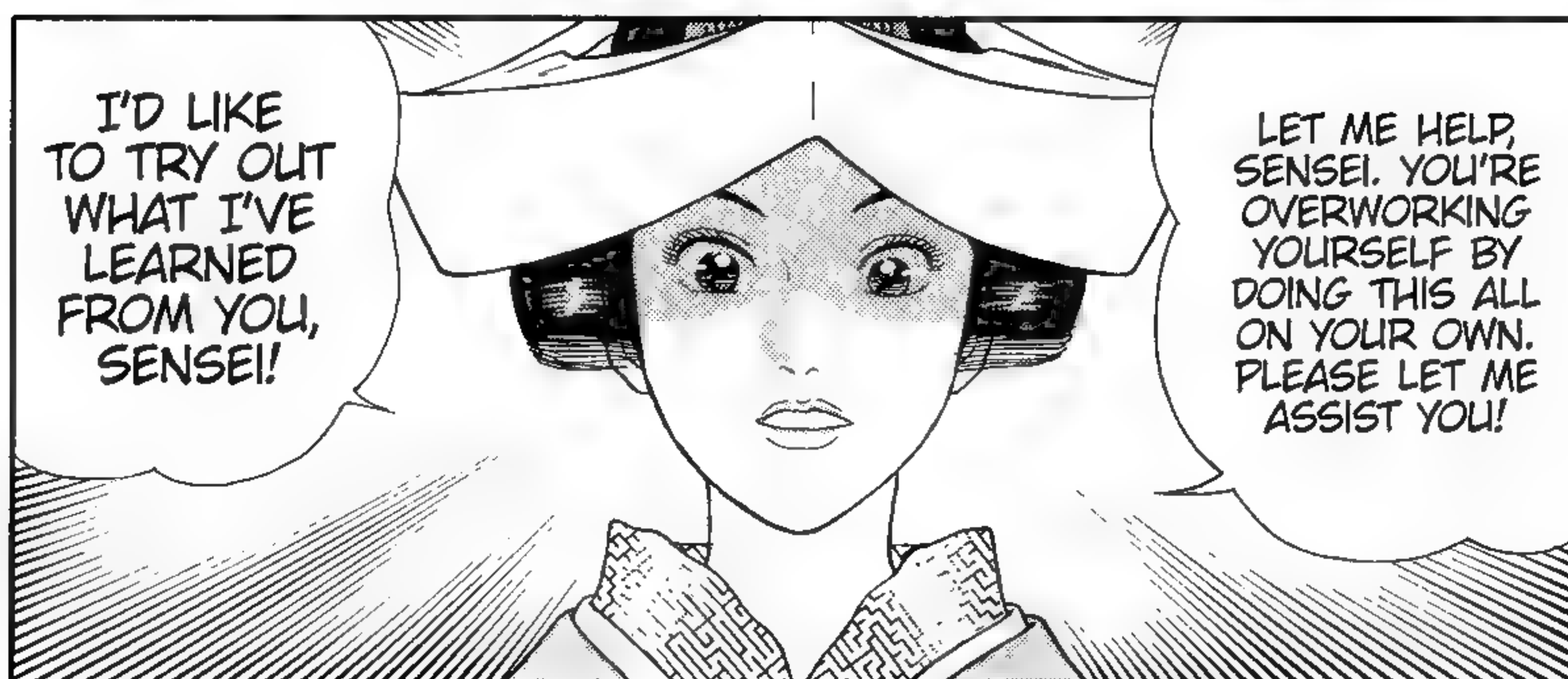
I'M ALREADY  
INSIDE...



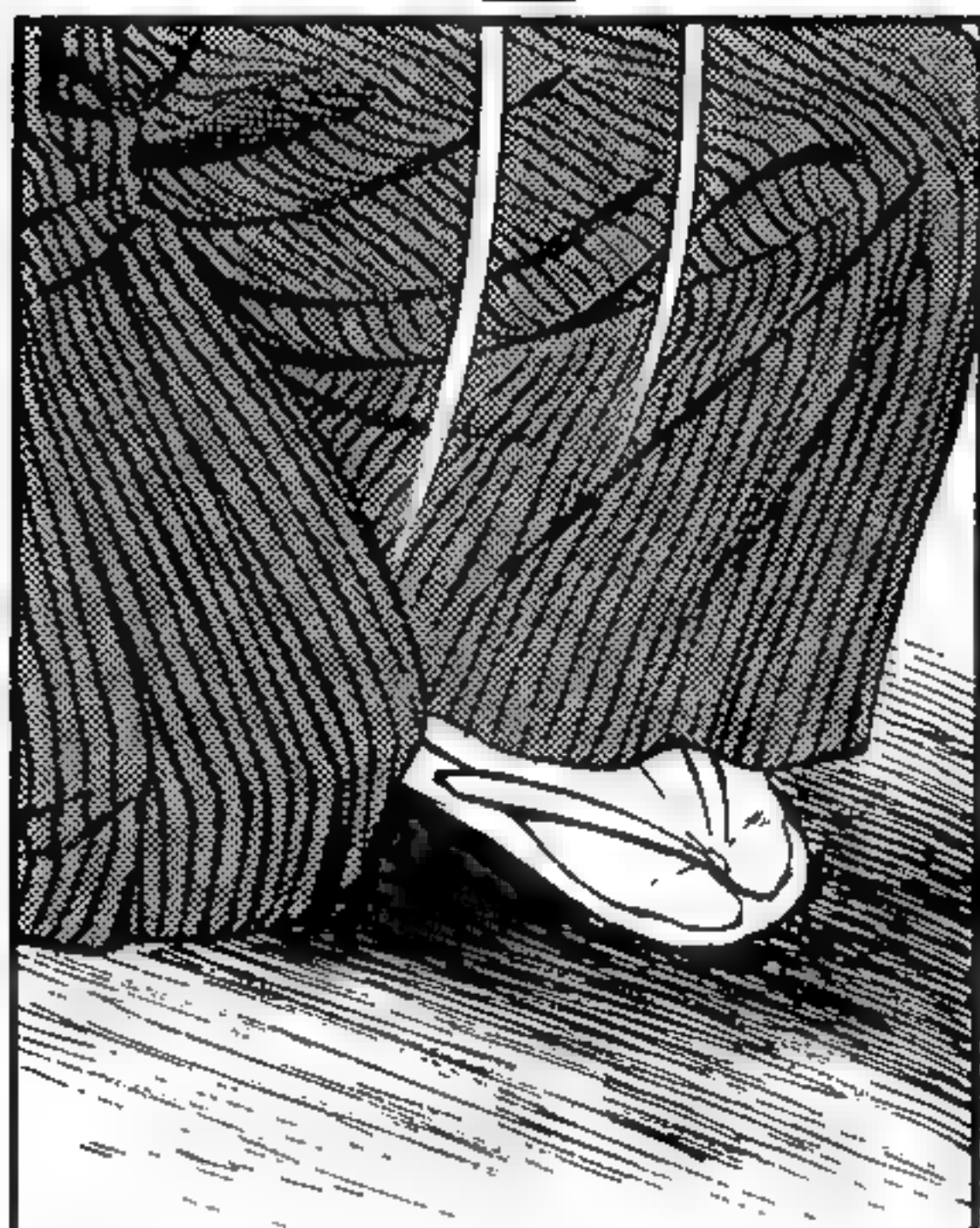
DON'T TOUCH  
ANYTHING! THERE'S  
SOME SHOCHU RIGHT  
OUTSIDE, SO SPRAY  
IT OVER YOURSELF  
TO STERILIZE...

YOU CAN'T  
DO THIS,  
SAKI-SAN!  
LEAVE RIGHT  
NOW!













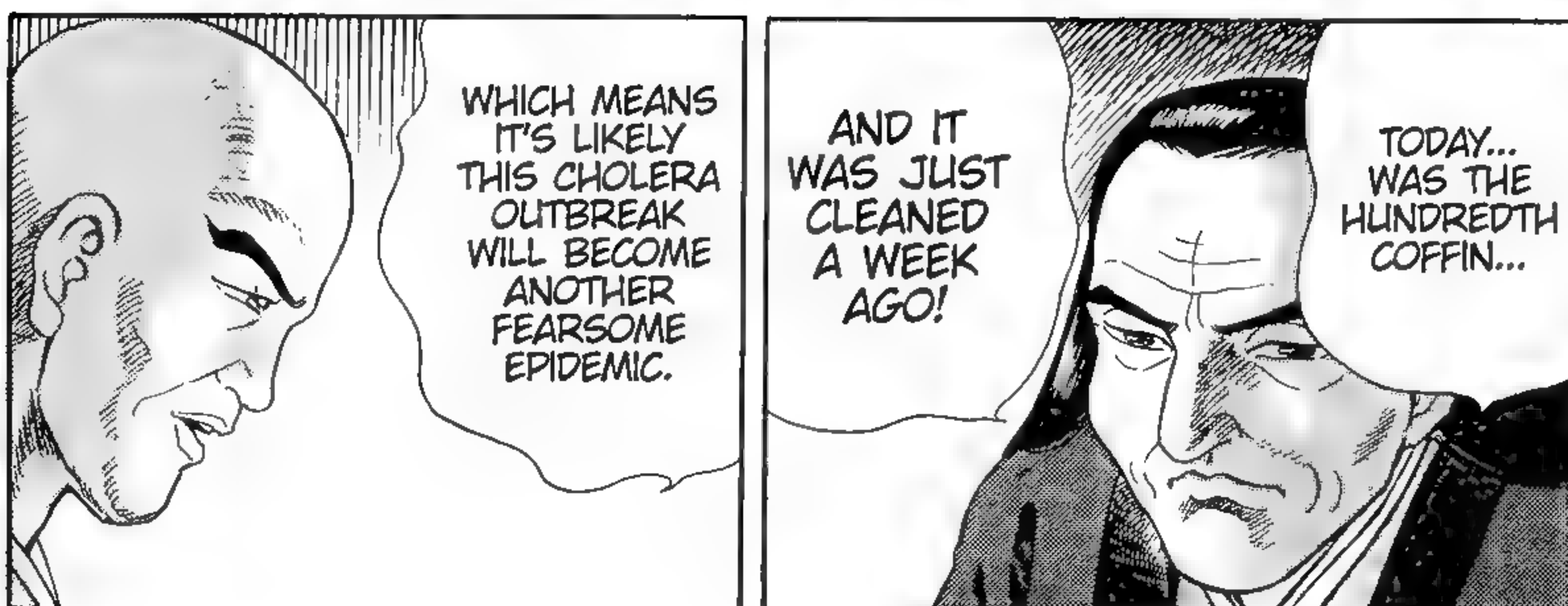
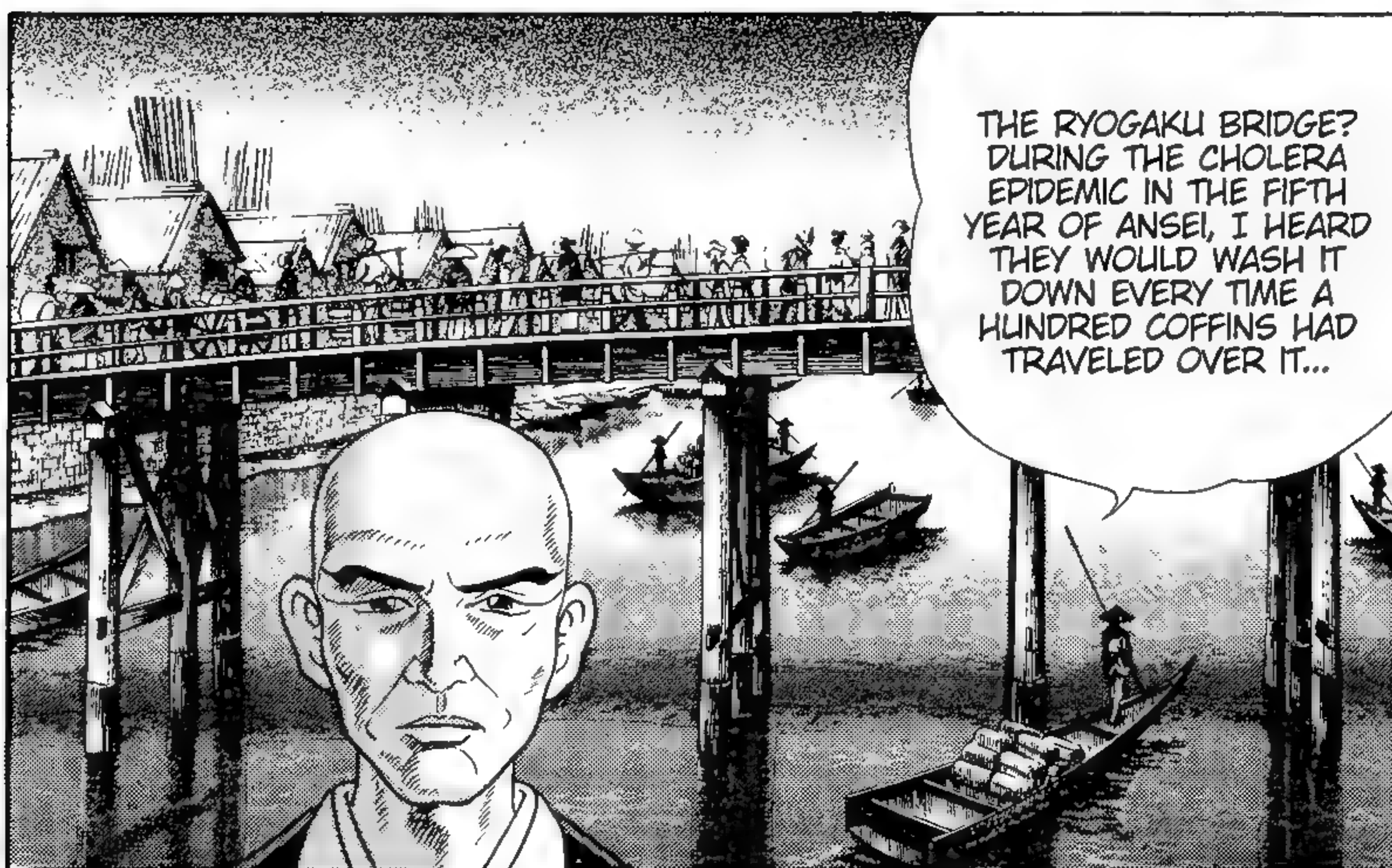
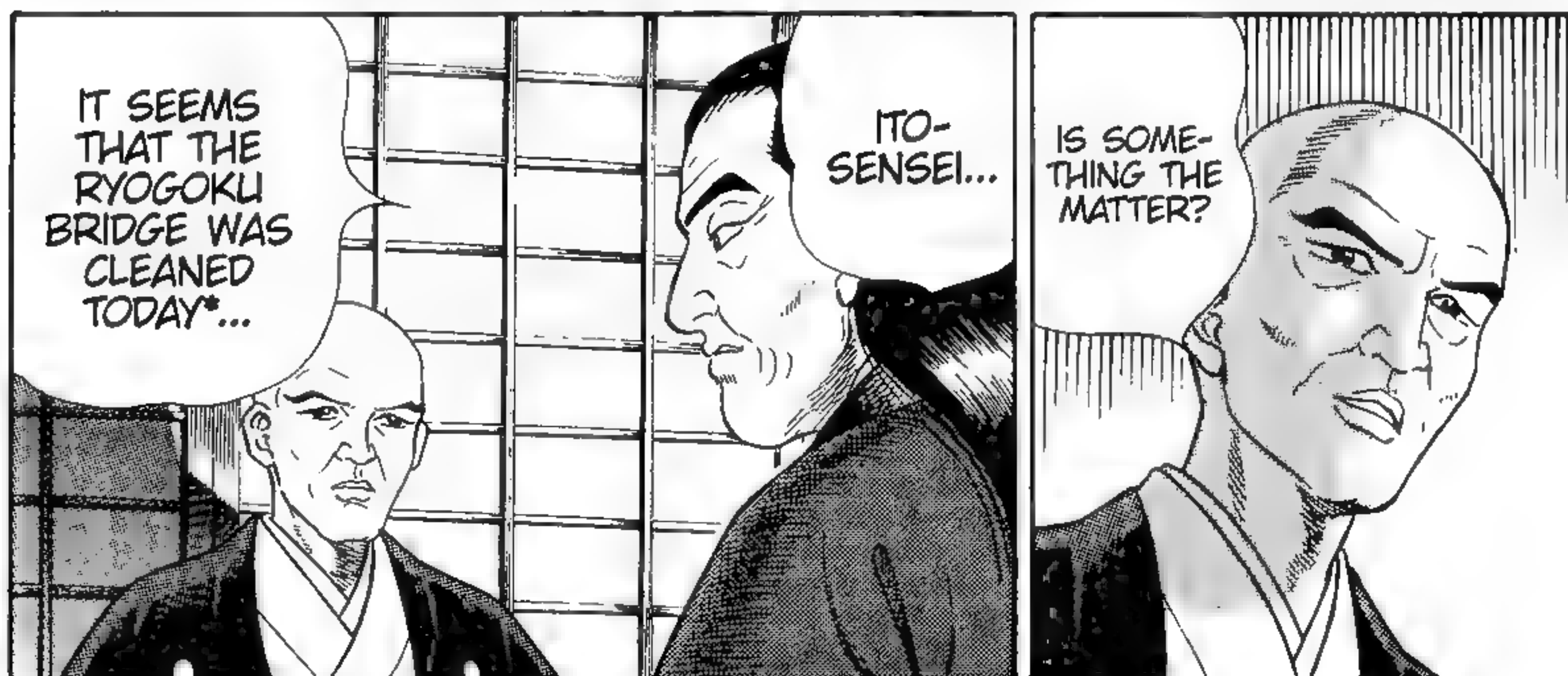




DIRECTOR OF  
THE WESTERN  
MEDICAL  
INSTITUTE  
KOAN  
OGATA



\*THE RYOGOKU BRIDGE WAS A FAMED BRIDGE IN TOKYO WHICH JOINED TWO PROVINCES TOGETHER, NAMELY THE EDO AND SHIMOLISA PROVINCE, AND HAD LOTS OF TRAFFIC DURING THE EDO PERIOD. THE BRIDGE STILL EXISTS TODAY, ALTHOUGH IT HAS BEEN REBUILT TO FOLLOW MODERN ARCHITECTURE.







AT THIS POINT,  
IF WE DON'T DO  
SOMETHING TO  
STOP CHOLERA  
FROM BECOMING  
AN EPIDEMIC, EDO  
WILL BECOME A  
CITY OF DEATH.

JUST THIS PAST  
SUMMER, THERE  
WERE ALREADY  
COUNTLESS DEATHS  
BECAUSE OF THE  
MEASLE EPIDEMIC,  
AND NOW...



DESPITE THE  
FACT THAT WE'RE  
DUTCH MEDICINE  
DOCTORS WHO'VE  
STUDIED WESTERN  
MEDICAL TECH-  
NIQUES!

BUT WE  
STILL HAVEN'T  
EVEN FOUND AN  
EFFECTIVE WAY  
TO DEAL WITH  
CHOLERA...

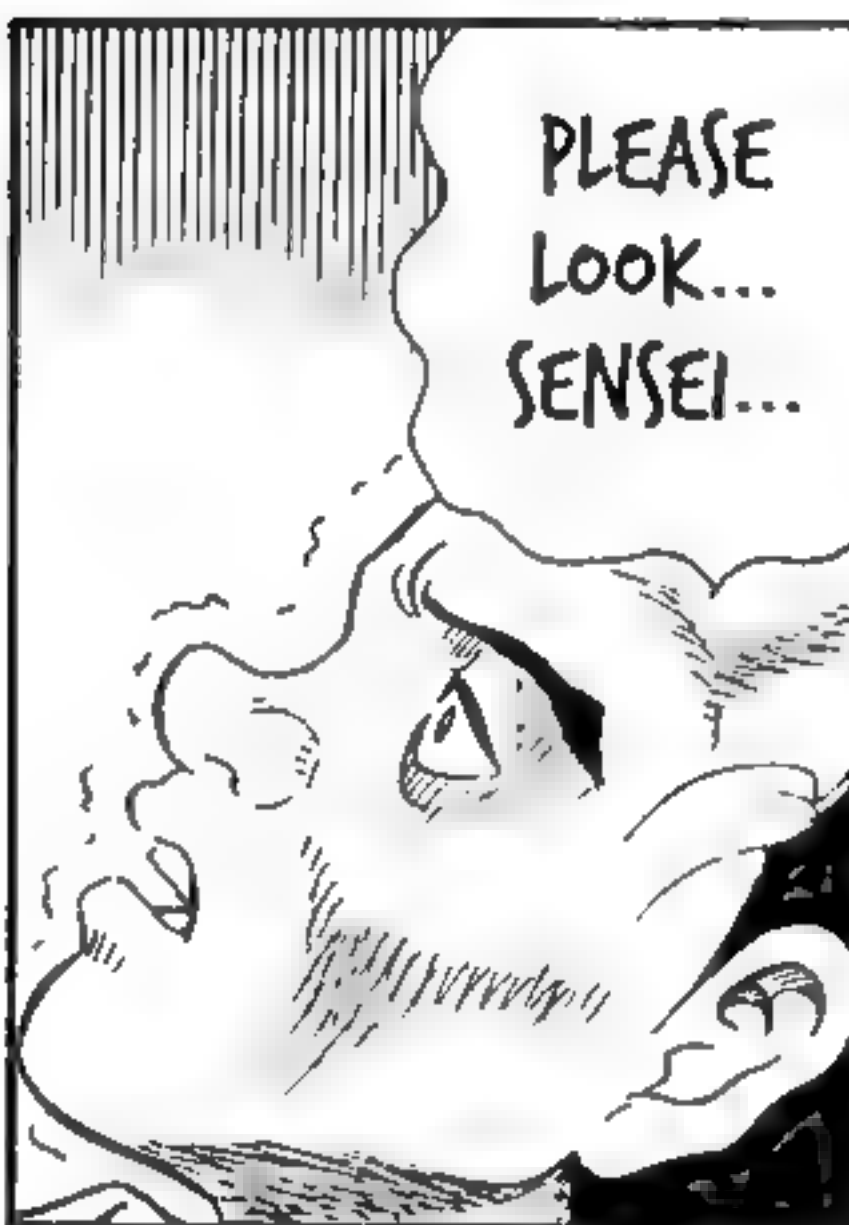


AS A  
DOCTOR,  
I WANT TO  
SEE WHAT  
MINAKATA-  
SENSEI IS  
DOING TO  
TREAT IT!

THIS  
ISN'T THE  
TIME TO BE  
FUSSING  
ABOUT  
HONOR.











BASED ON WHAT I'VE LEARNED FROM DR. POMPE'S TREATMENT METHOD OF CHOLERA, THE PATIENT MUST BE GIVEN A MIXTURE OF QUININE AND OPIUM EVERY HOUR...

THEN THE PATIENT'S BODY MUST BE WIPED WITH EITHER A SHEET OR CLOTH DIPPED IN TURPENTINE OIL IN ORDER TO INVIGORATE THE EPIDERMAL FUNCTION AND THEIR SKIN MUST BE RUBBED DOWN AFTER THE PATIENT HAS BEEN SUBMERGED IN A HOT BATH OF OVER 90 DEGREES FAHRENHEIT...



HE KEEPS INJECTING ME FULL OF THAT STRANGE LIQUID... AND I THINK BECAUSE OF THAT, I'VE BEEN HAVING THE MOST INCESSANT DIARRHEA...

IT'S ALMOST LIKE ANYTHING THAT I PUT IN ME JUST COMES OUT THE OTHER SIDE AS IF I'M A PIPE...



AT THIS RATE, I'M GOING TO BE KILLED...!

SHIVER  
IV!

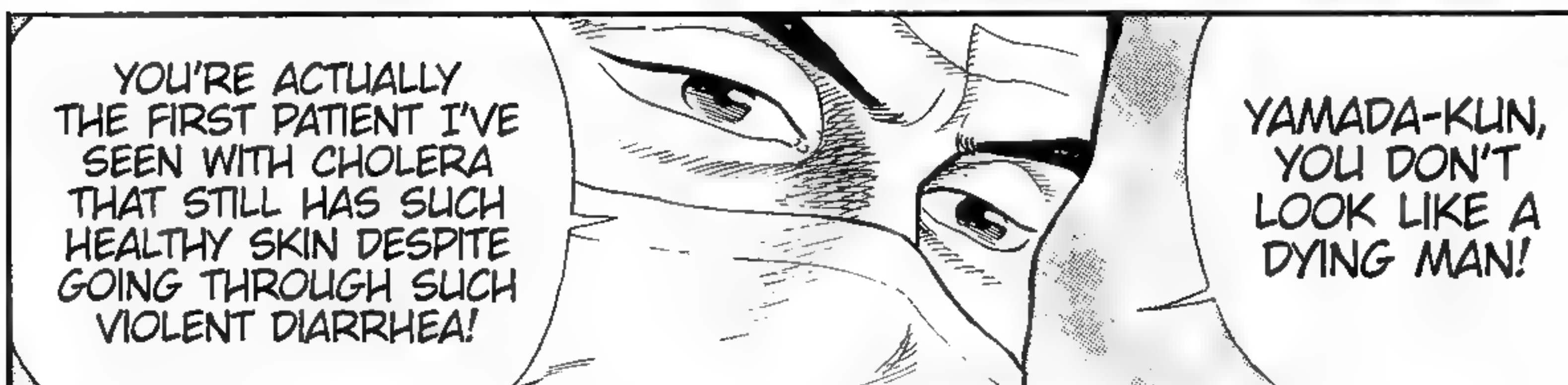
AH!



ALL HE DOES IS MAKE ME DRINK THAT WATER WITH SALT AND SUGAR IN IT AND INJECT ME FULL OF THAT SALTY LIQUID USING THOSE TUBES!

YET, THIS MAN HAS DONE NOTHING CLOSE TO TREATING ME!

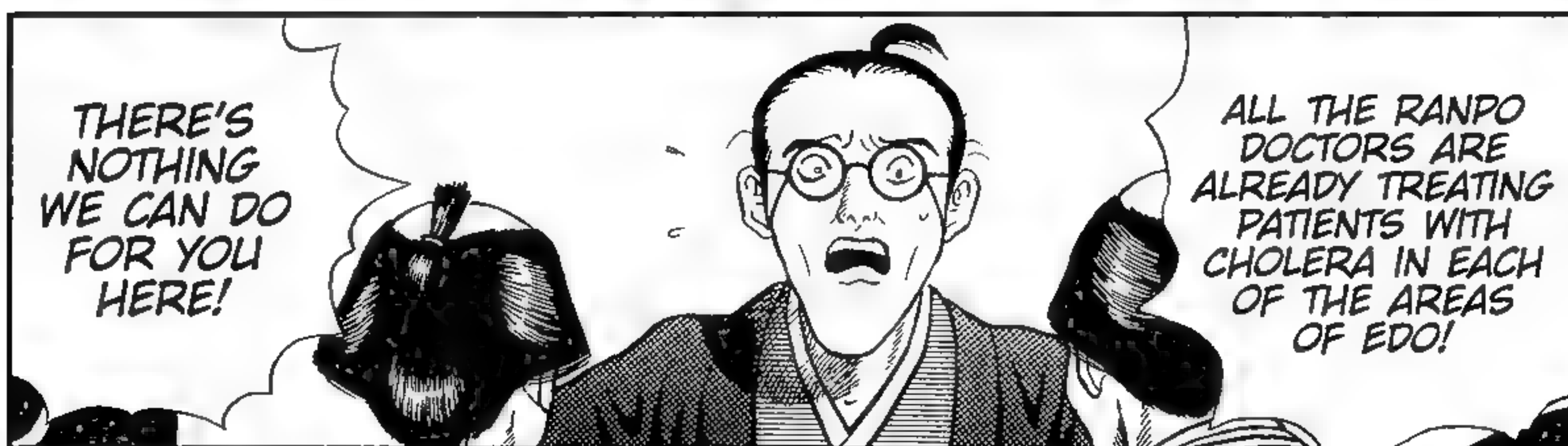




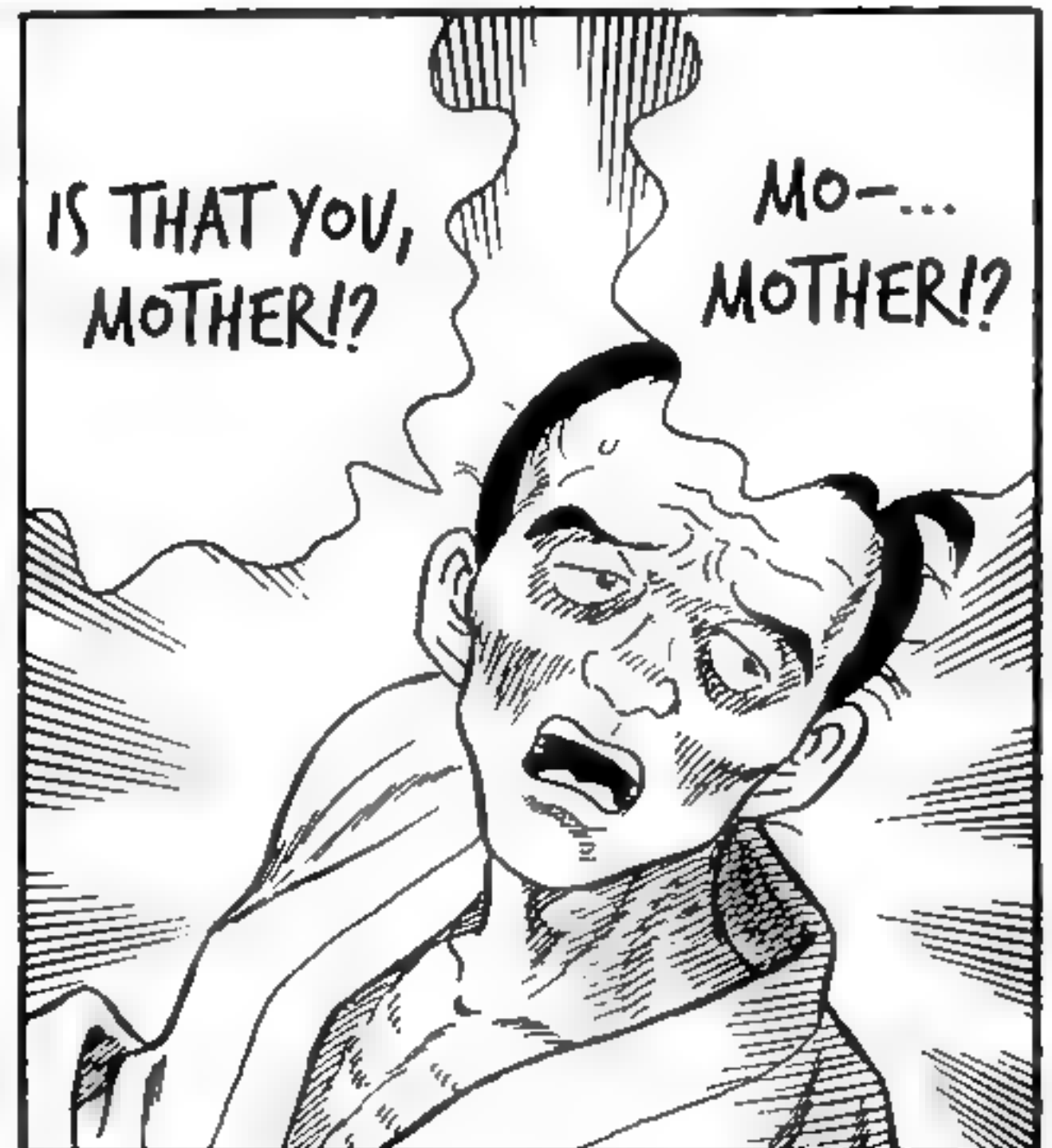
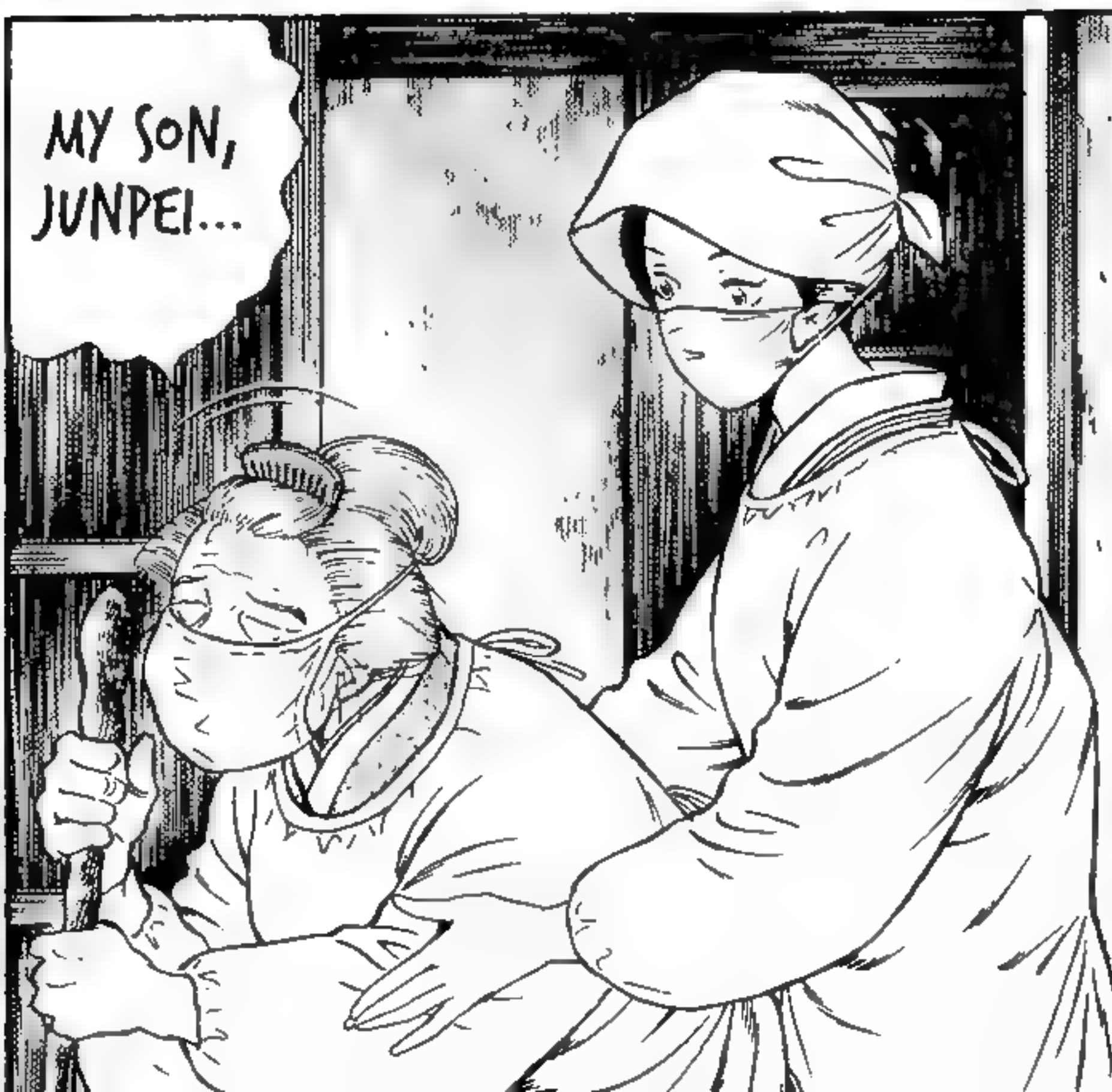
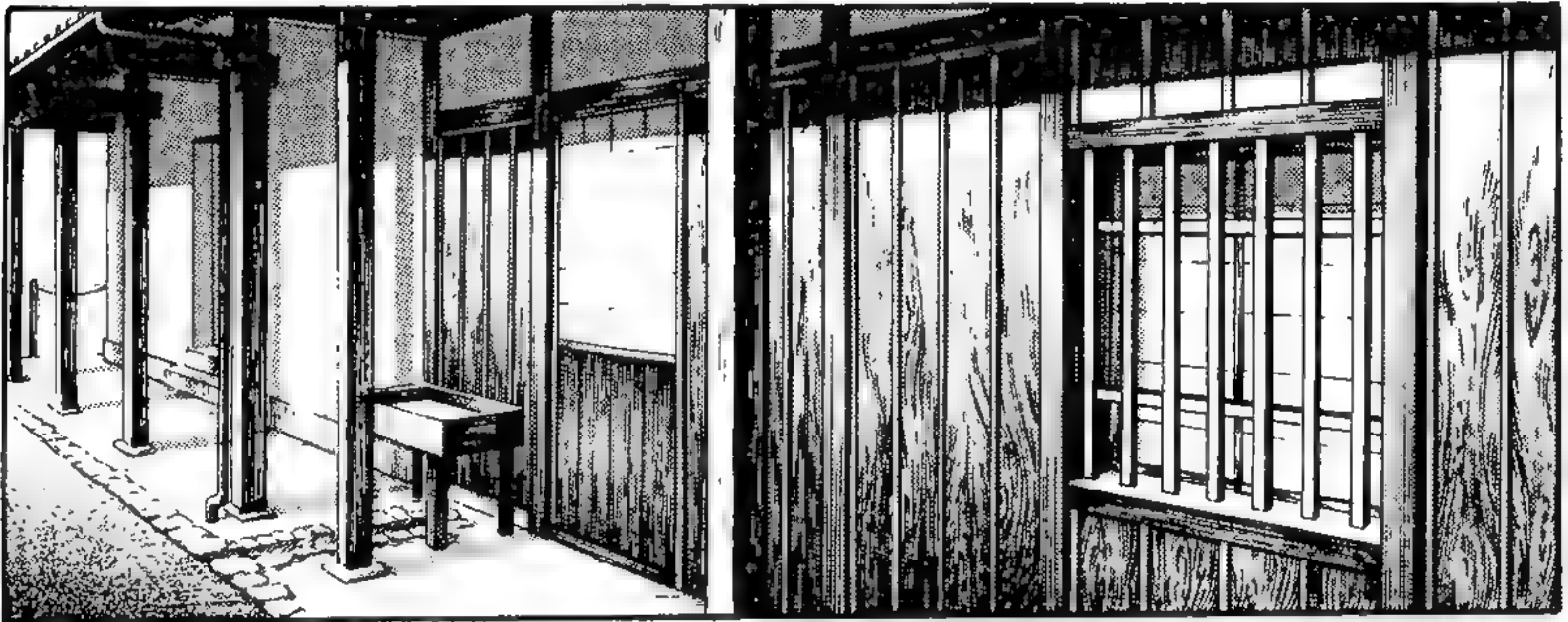
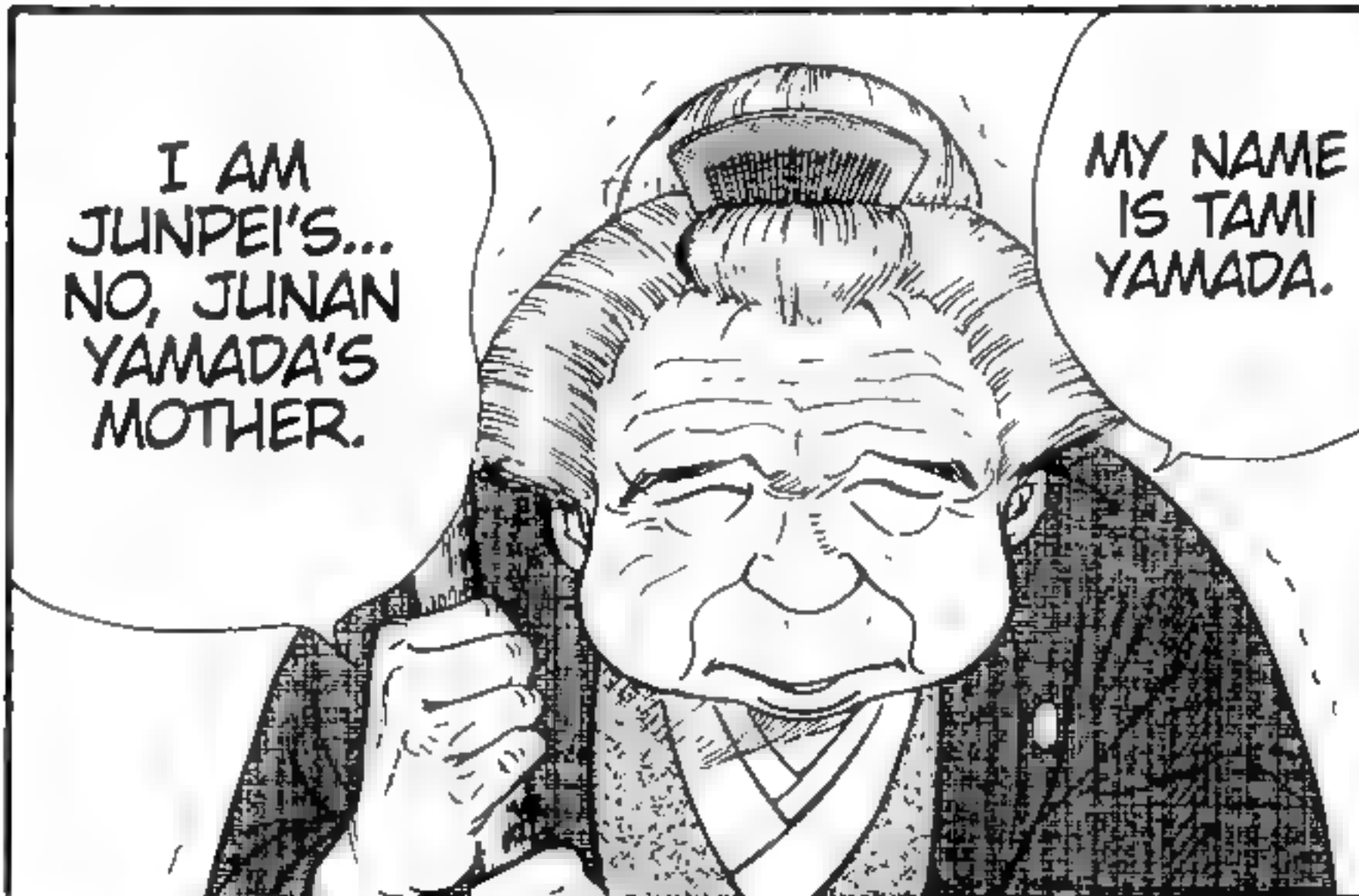
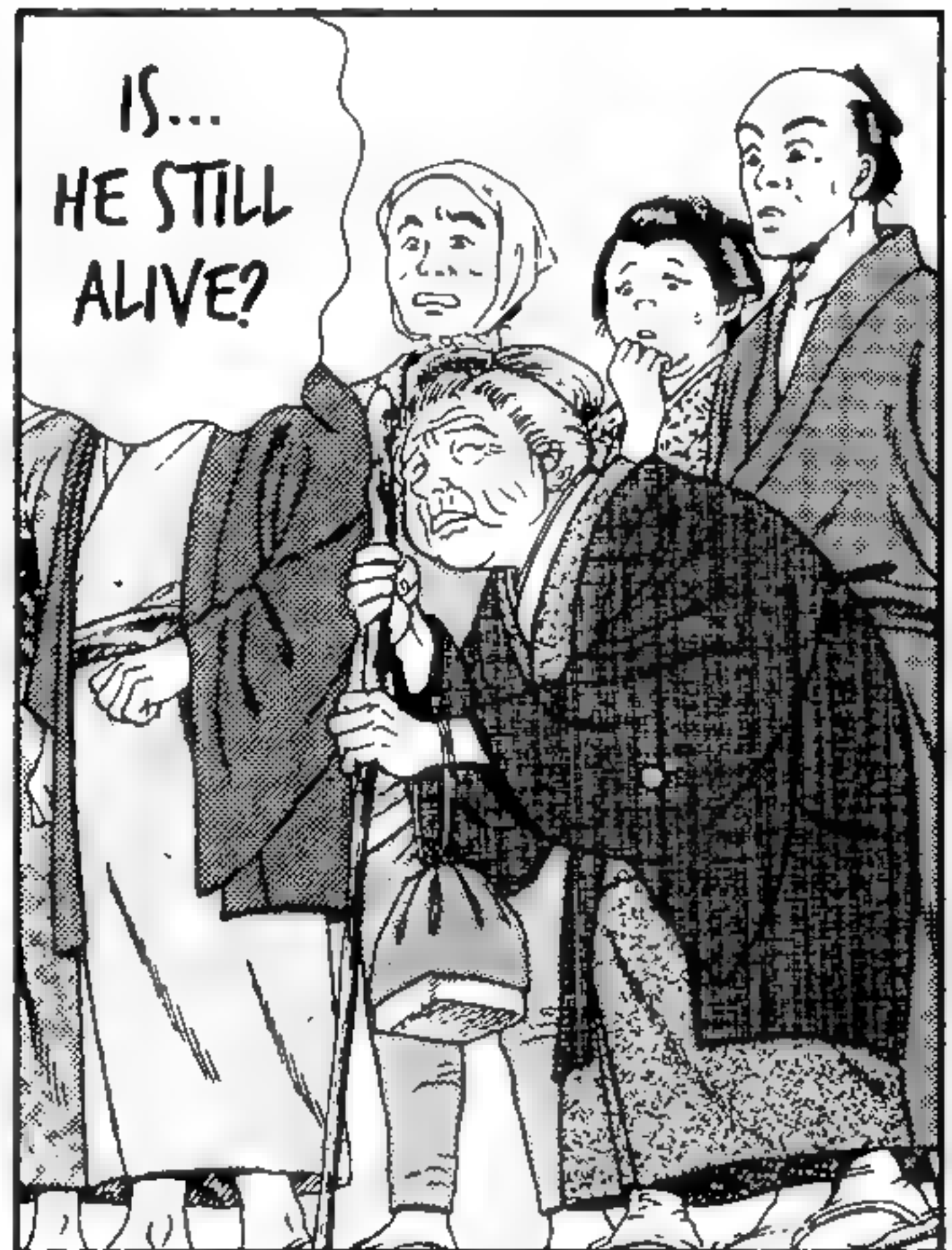




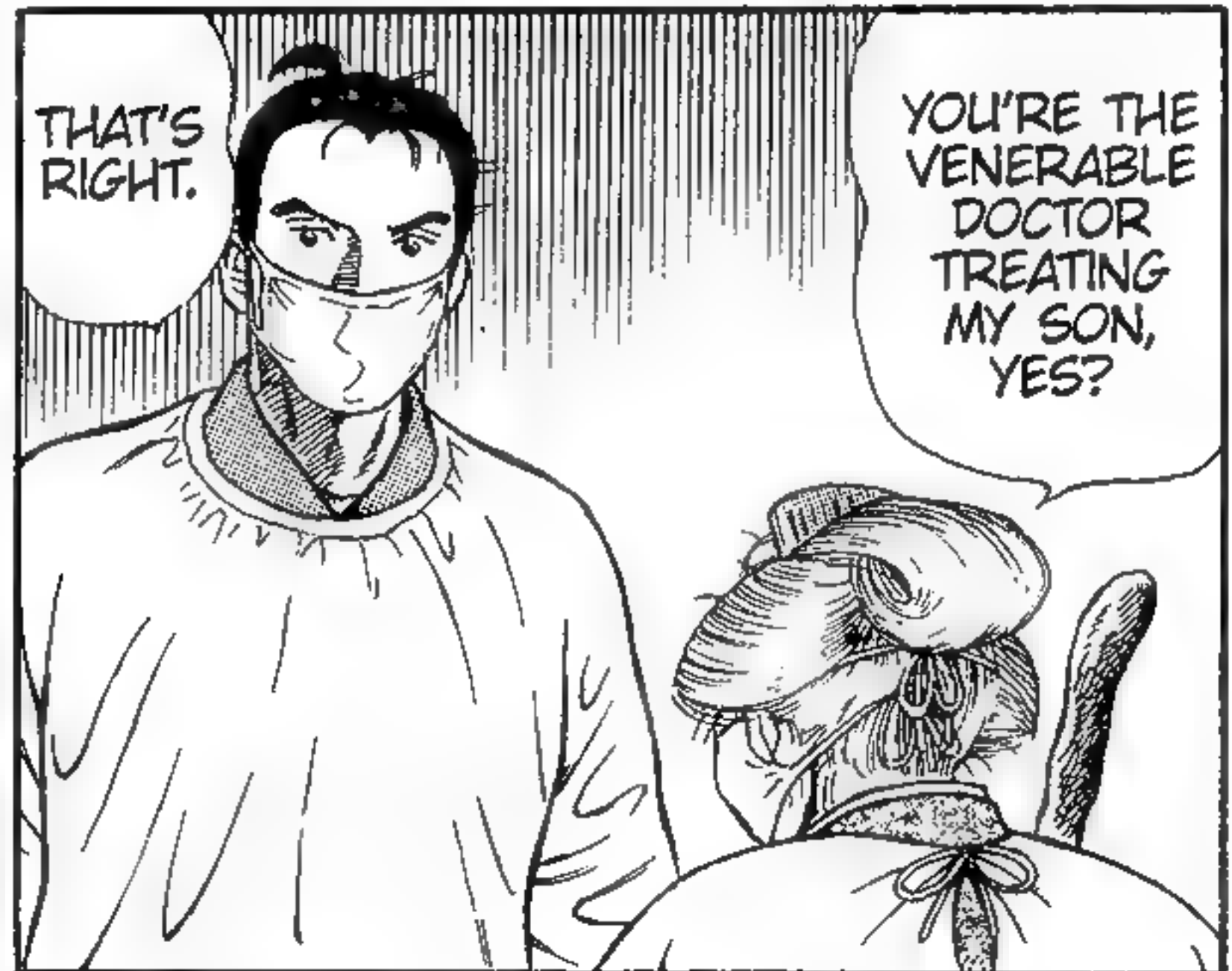
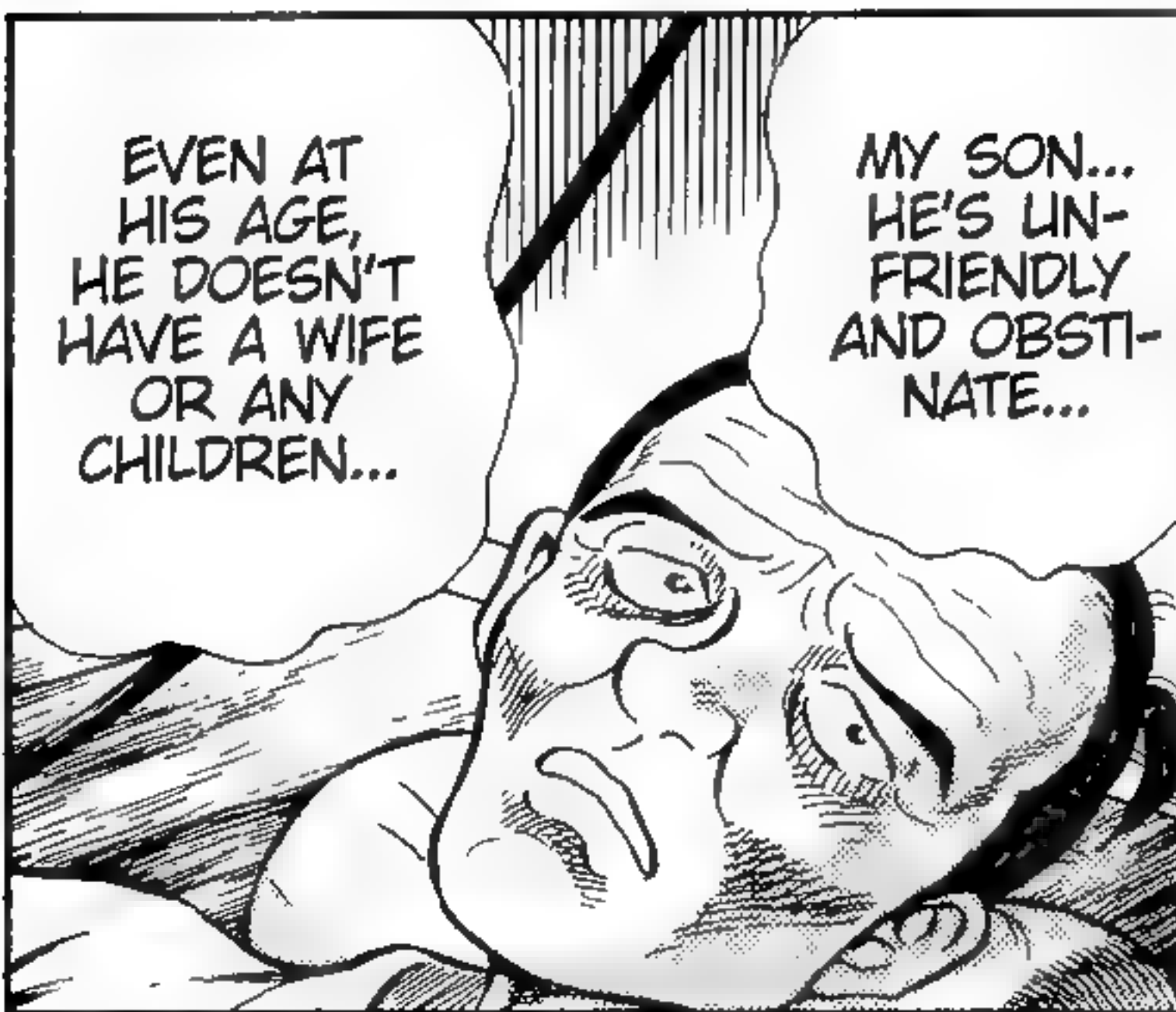








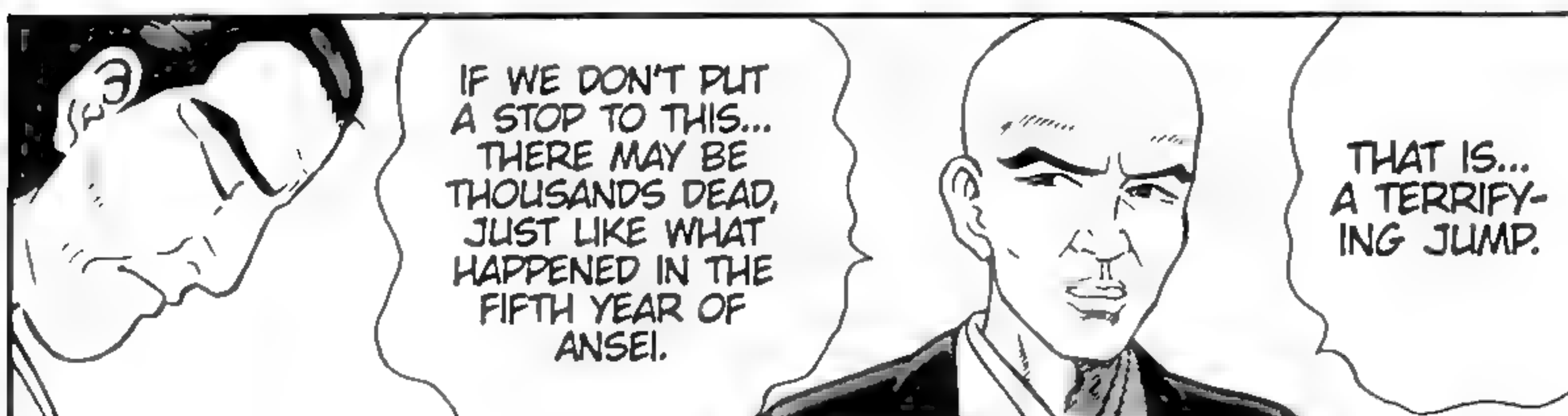




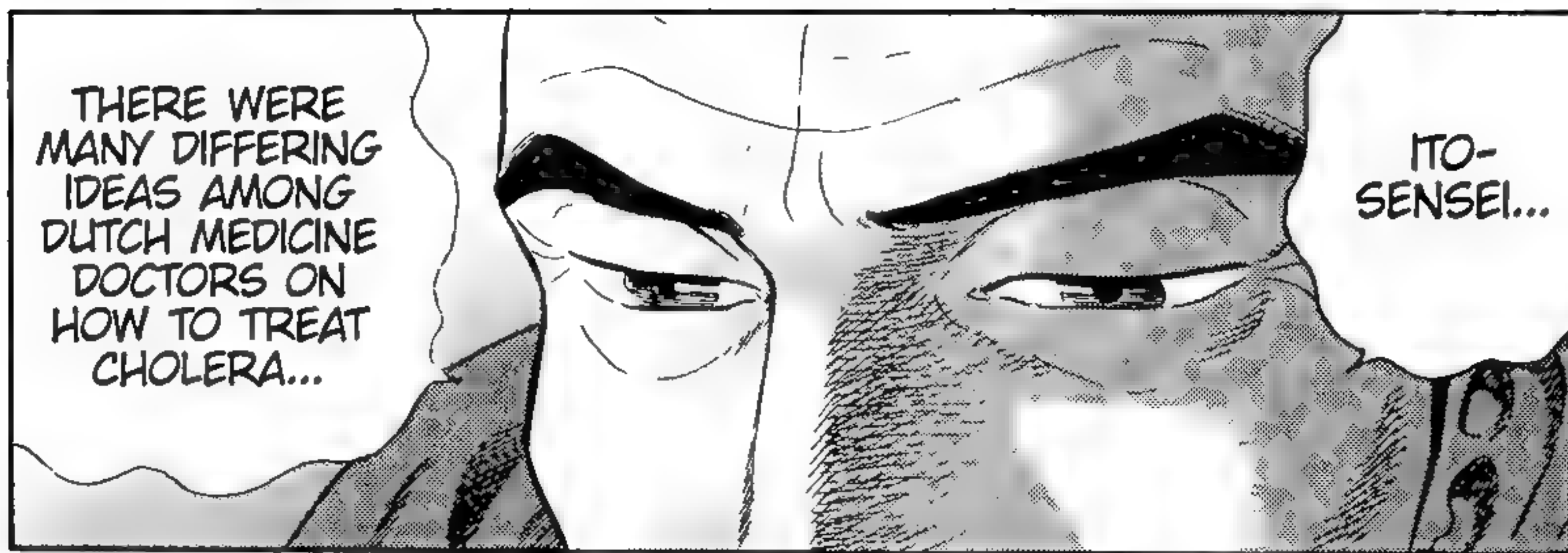




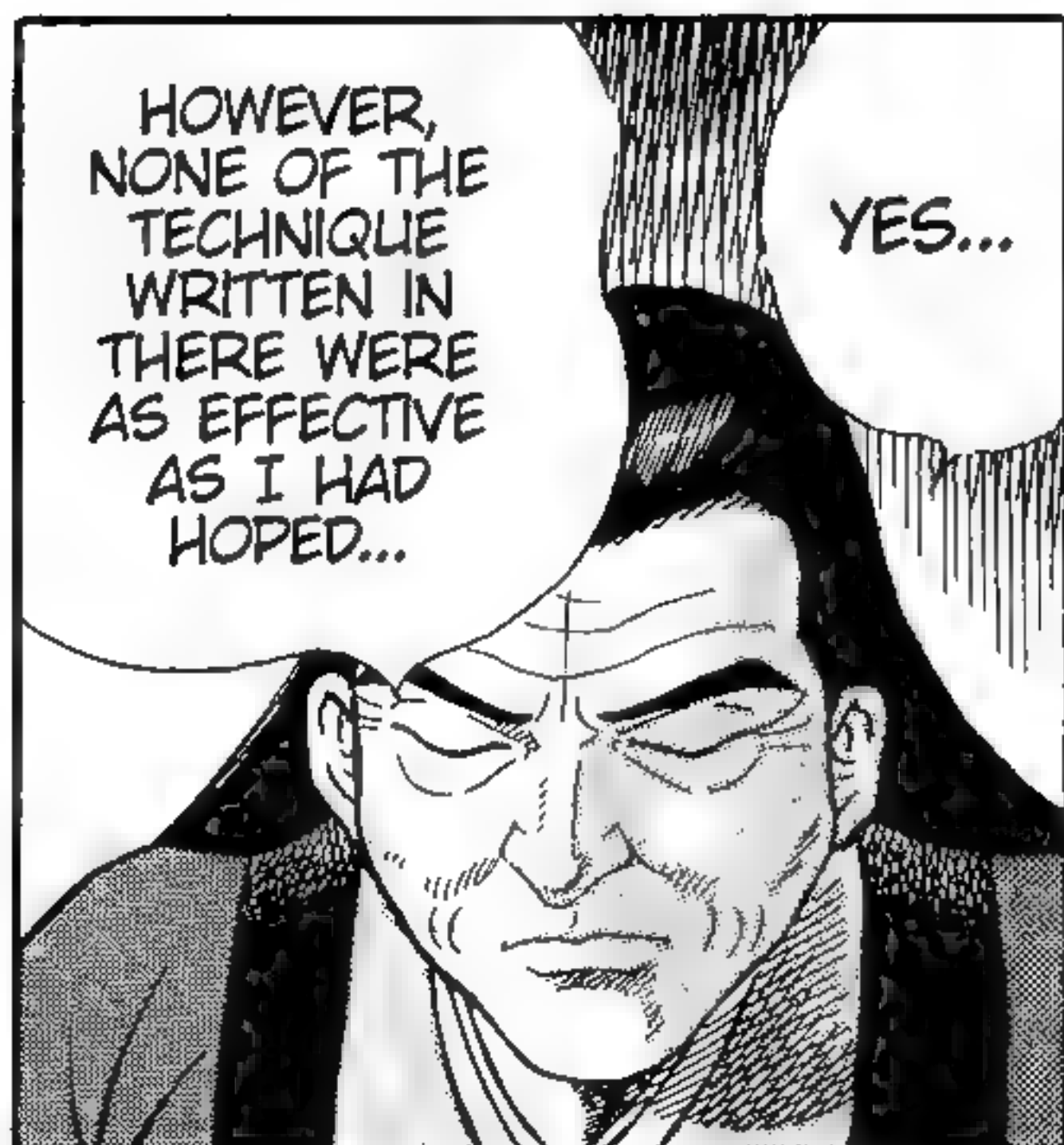




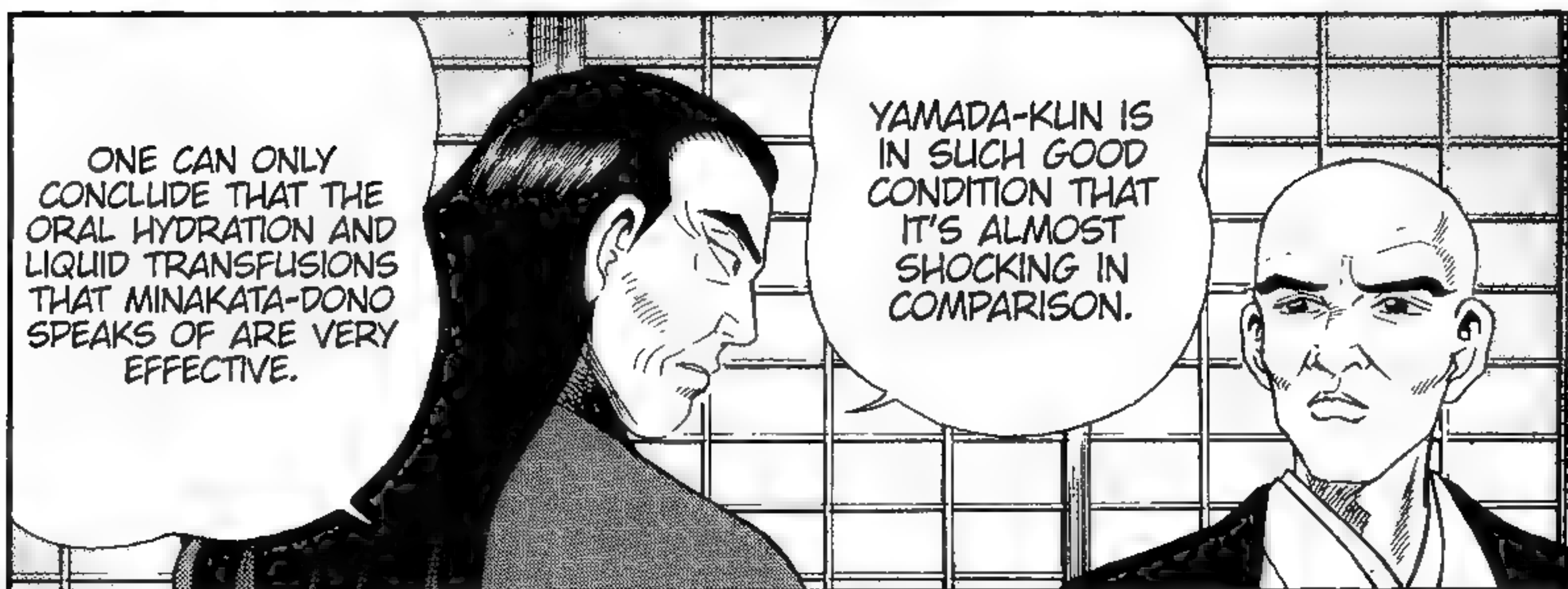
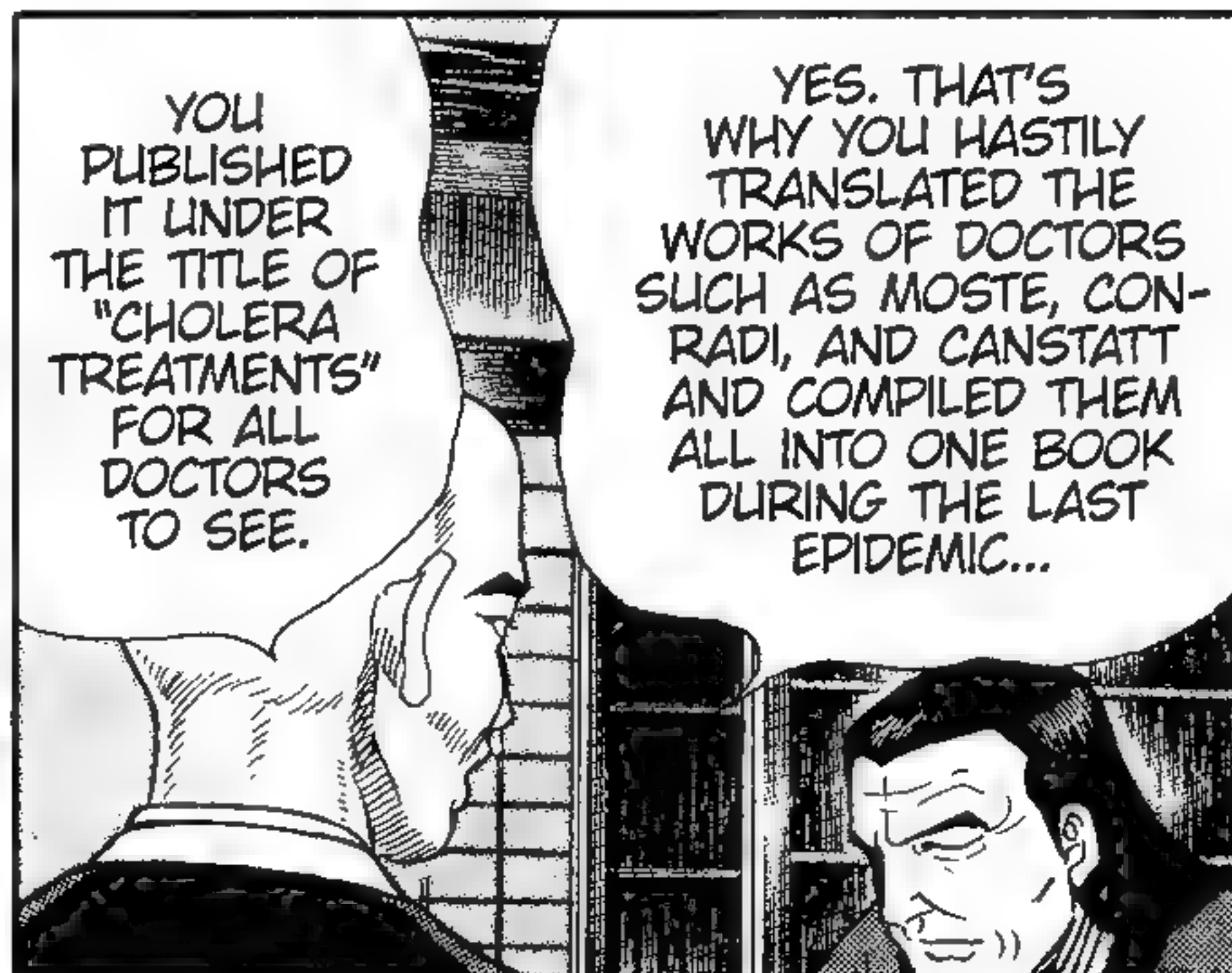




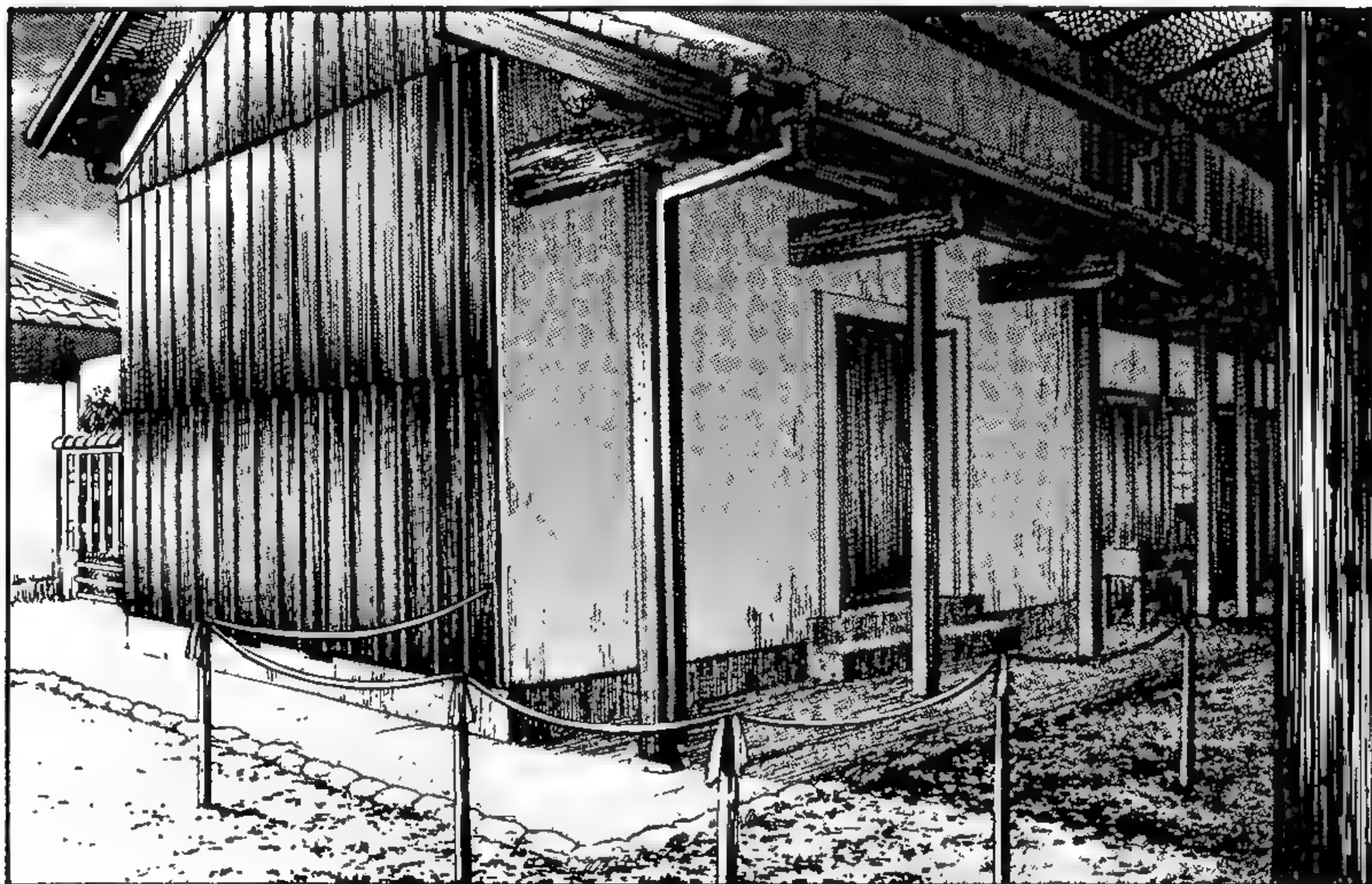
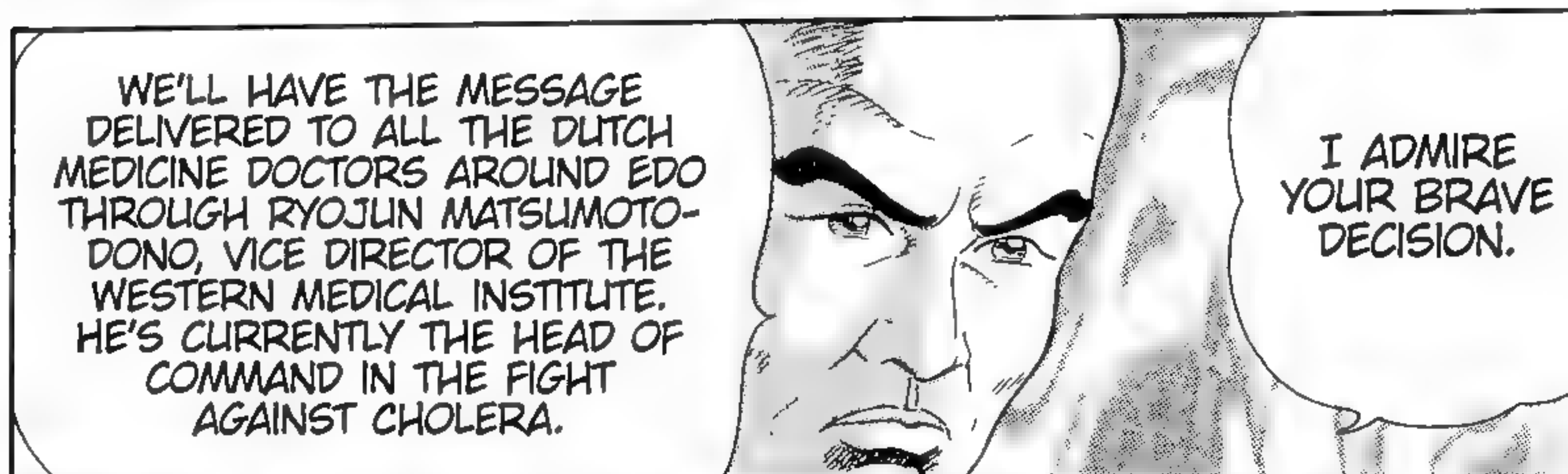




YES...











IT'S BEEN  
THREE DAYS  
SINCE MY  
DIARRHEA'S  
STOPPED, AND  
I CAN FINALLY  
URINATE!

I CAN  
PEE!

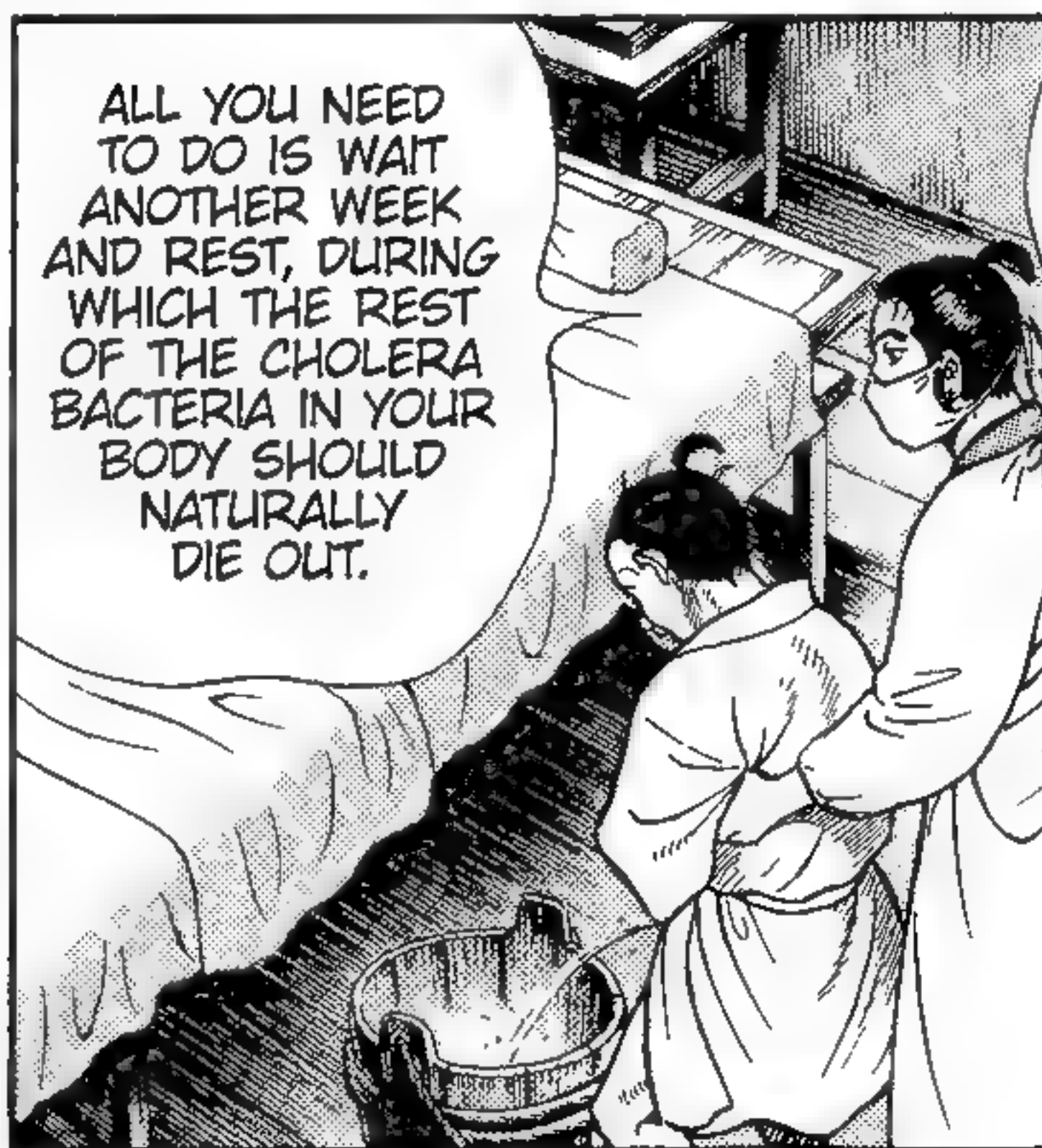


OH...  
OOH!



AFTER ALL  
THOSE INSULTS  
I SPAT AT YOU,  
YOU STILL  
TREATED ME SO  
PROFESSIONALLY.  
I DON'T KNOW  
WHAT TO SAY...

MINA-  
KATA-  
SENSEI...

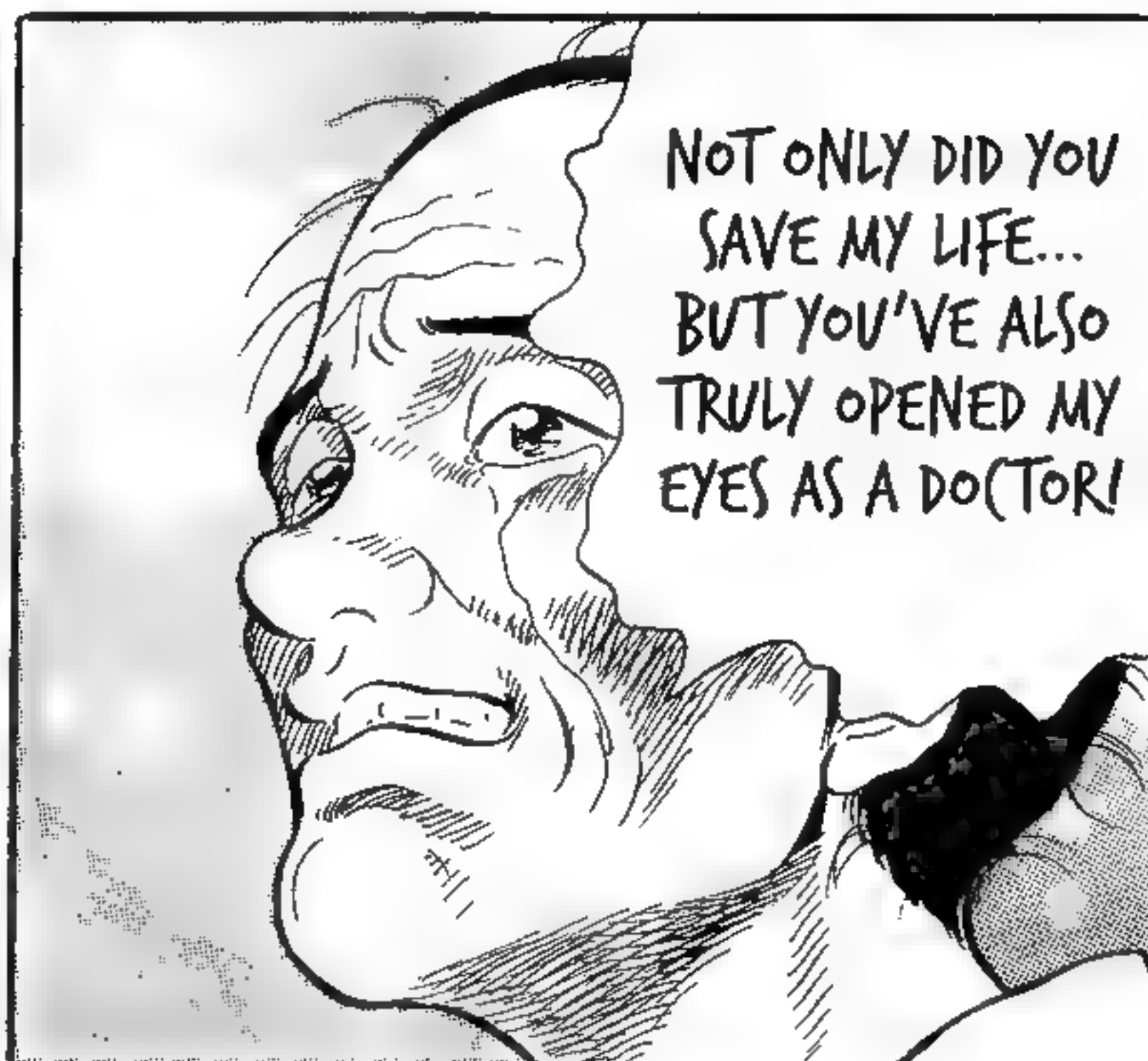


ALL YOU NEED  
TO DO IS WAIT  
ANOTHER WEEK  
AND REST, DURING  
WHICH THE REST  
OF THE CHOLERA  
BACTERIA IN YOUR  
BODY SHOULD  
NATURALLY  
DIE OUT.

YAMADA-  
SENSEI,  
NOW THAT  
YOU'RE ABLE  
TO GET UP  
ON YOUR  
OWN, YOU'RE  
CLEARLY ON  
YOUR WAY TO  
RECOVERY.

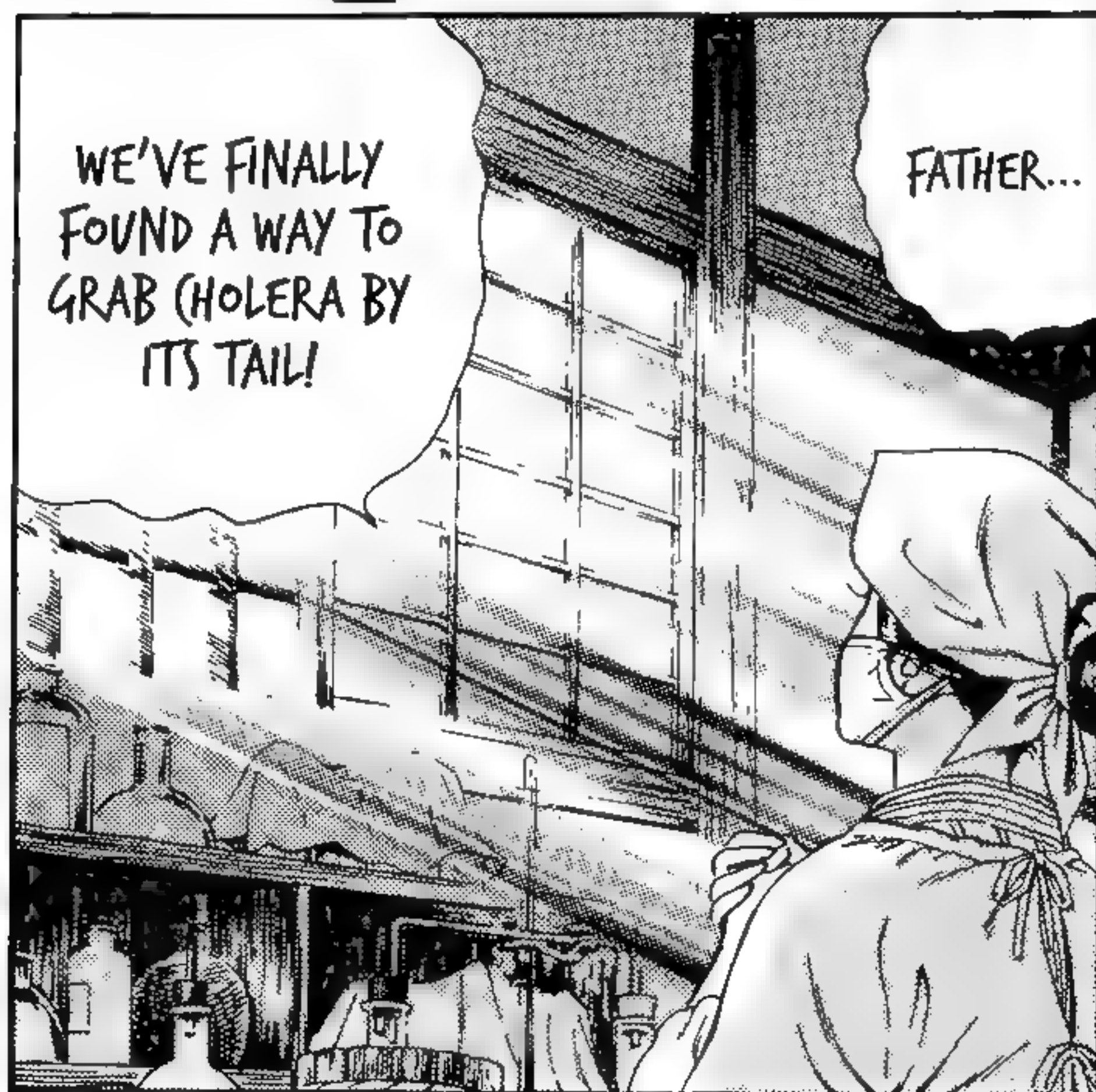


I'M VERY  
PLEASED  
TO HEAR  
THAT...



NOT ONLY DID YOU  
SAVE MY LIFE...  
BUT YOU'VE ALSO  
TRULY OPENED MY  
EYES AS A DOCTOR!





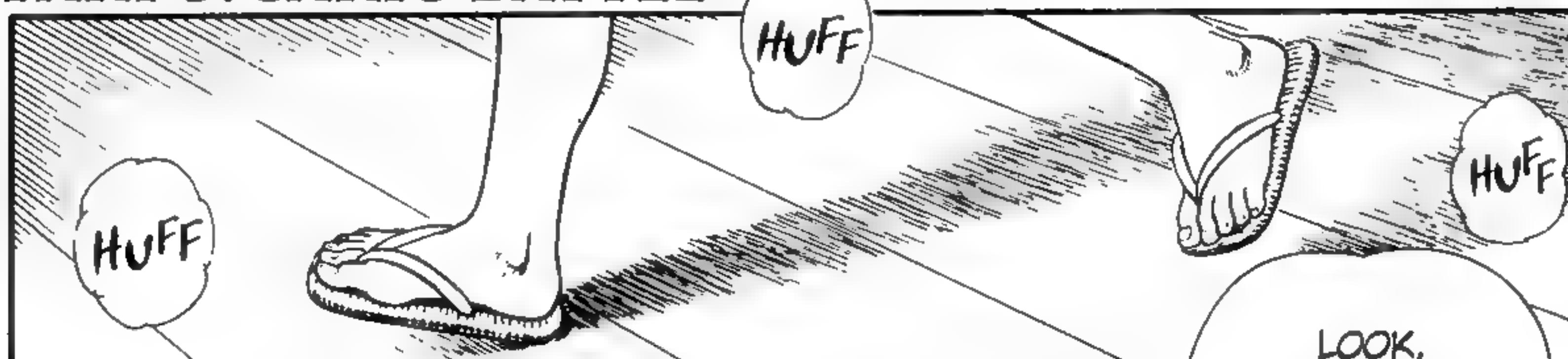






# HUMAN CHAPTER

## PART 5: SAKI'S BATTLE

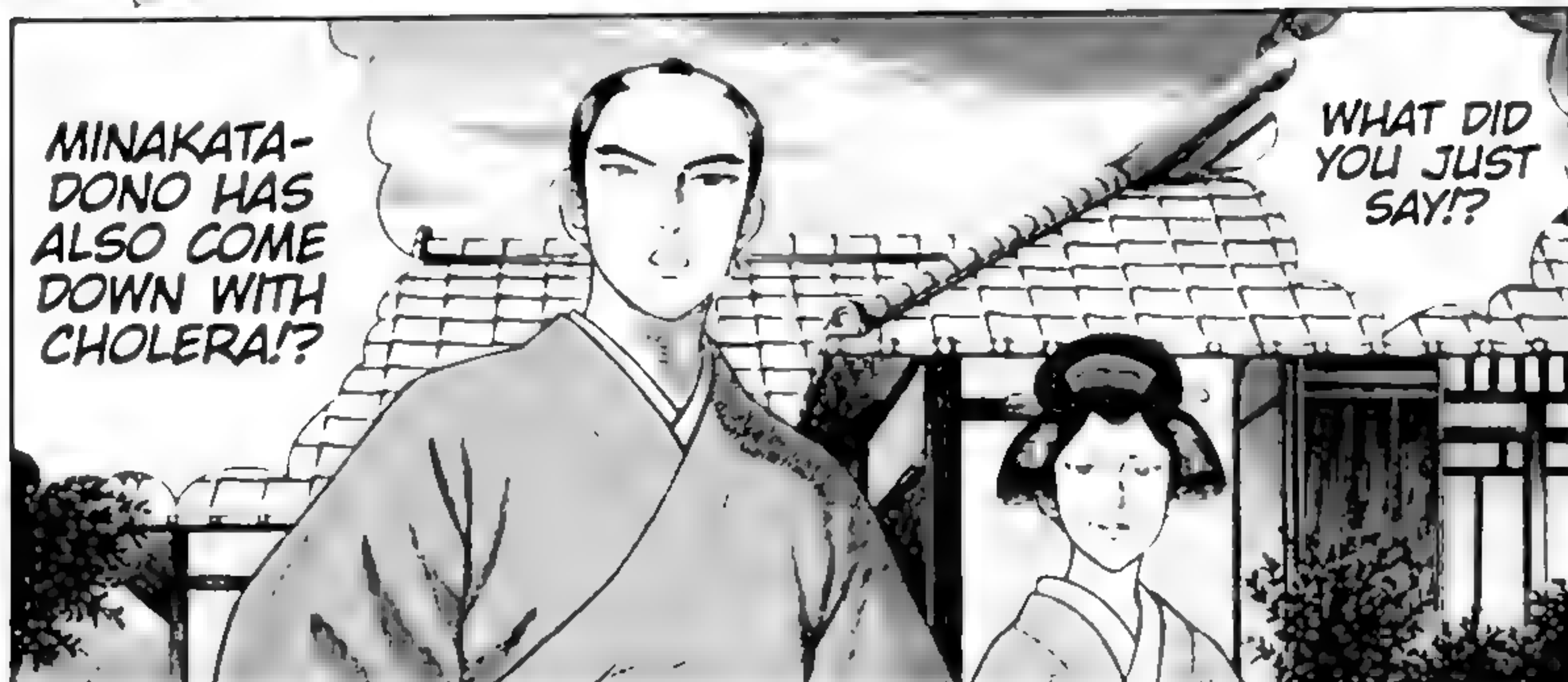
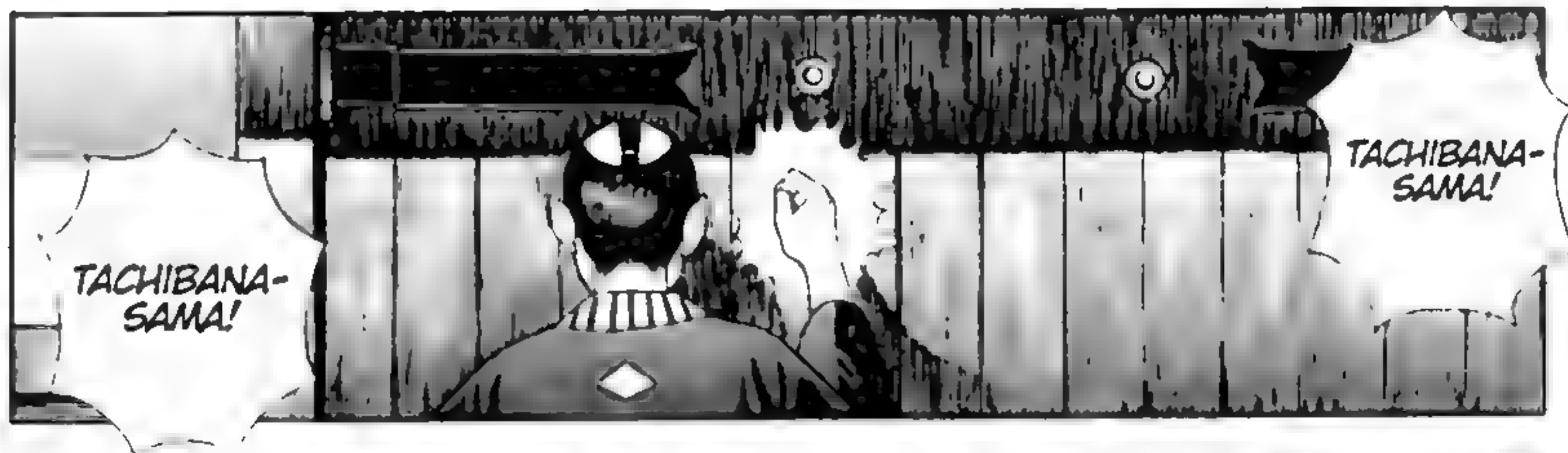




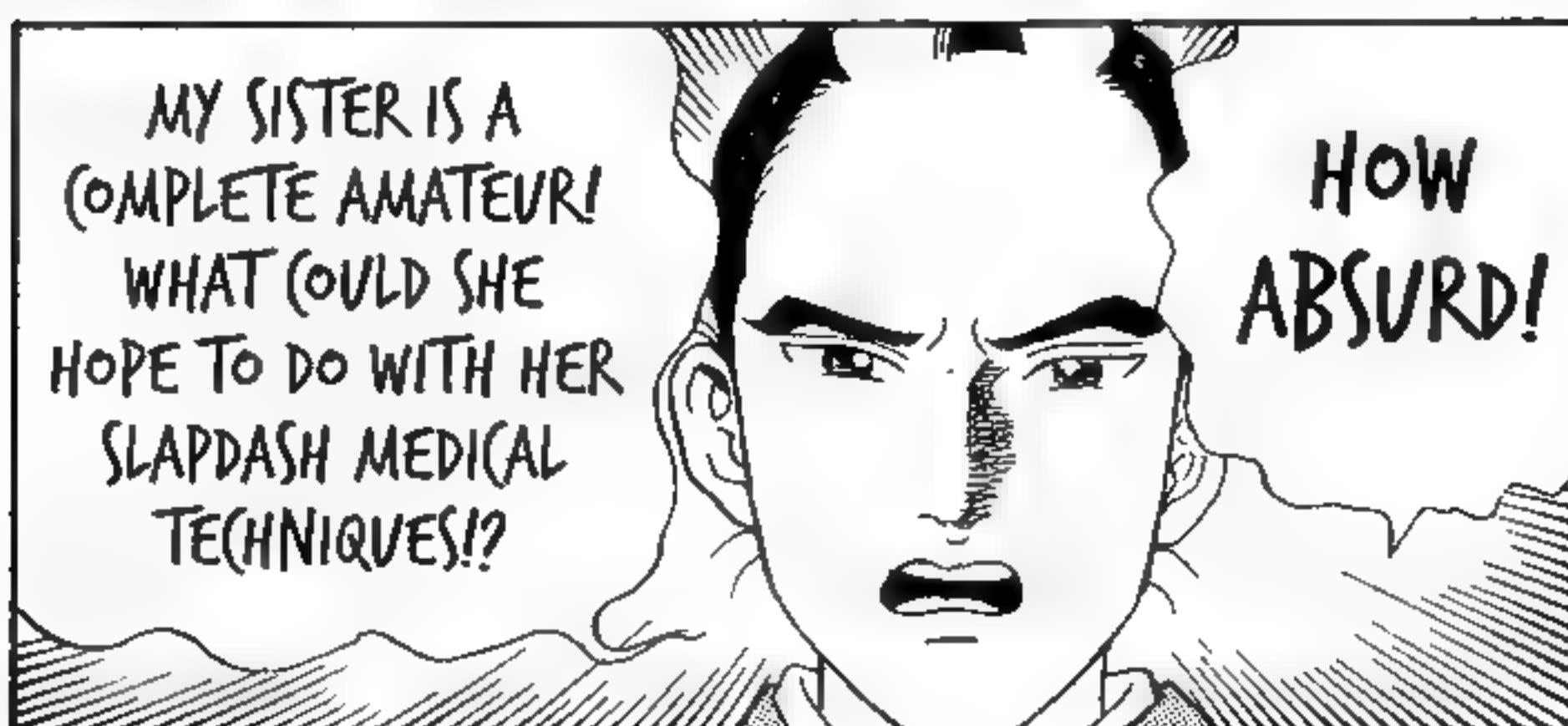
# HUMAN CHAPTER PART 5: SAKI'S BATTLE



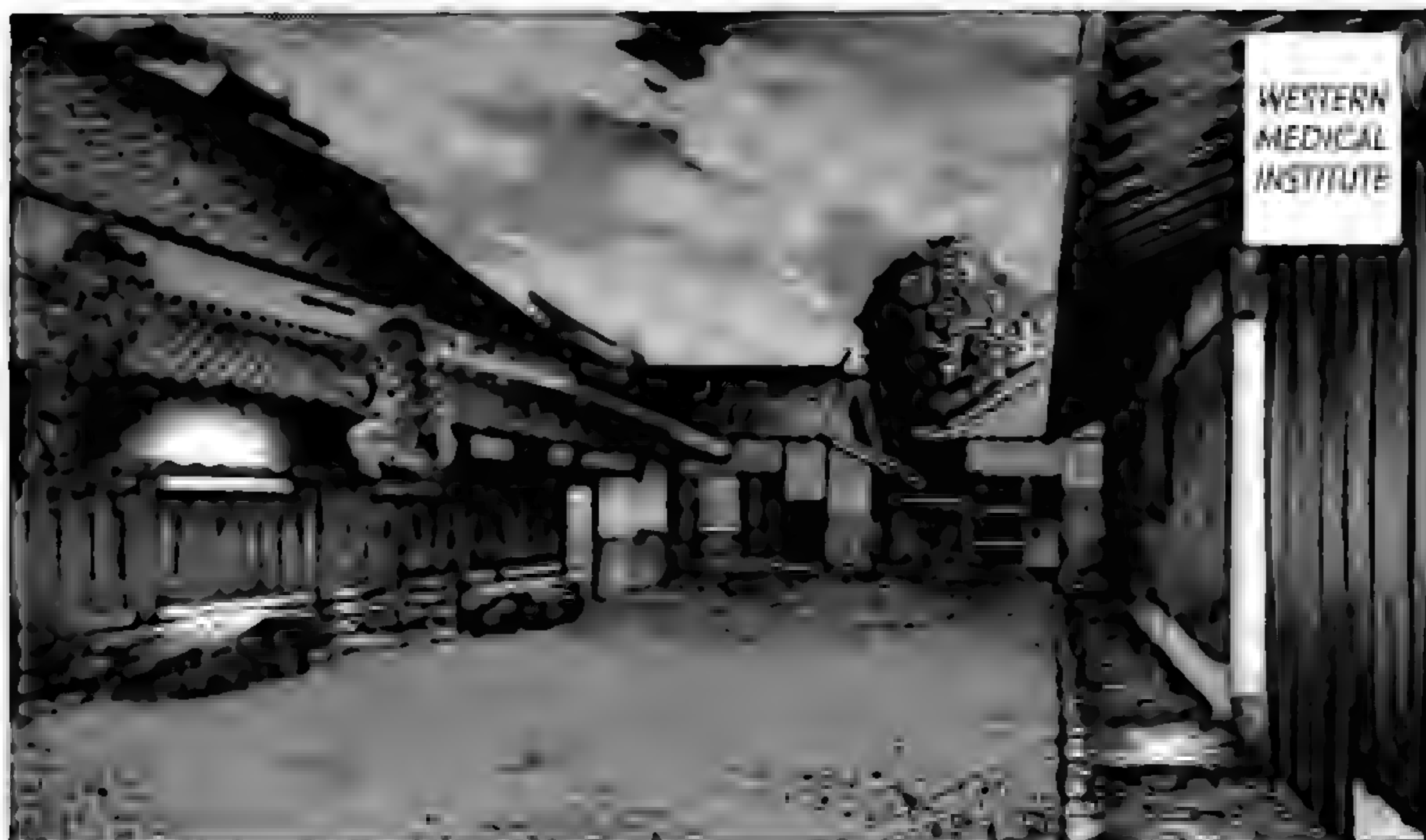




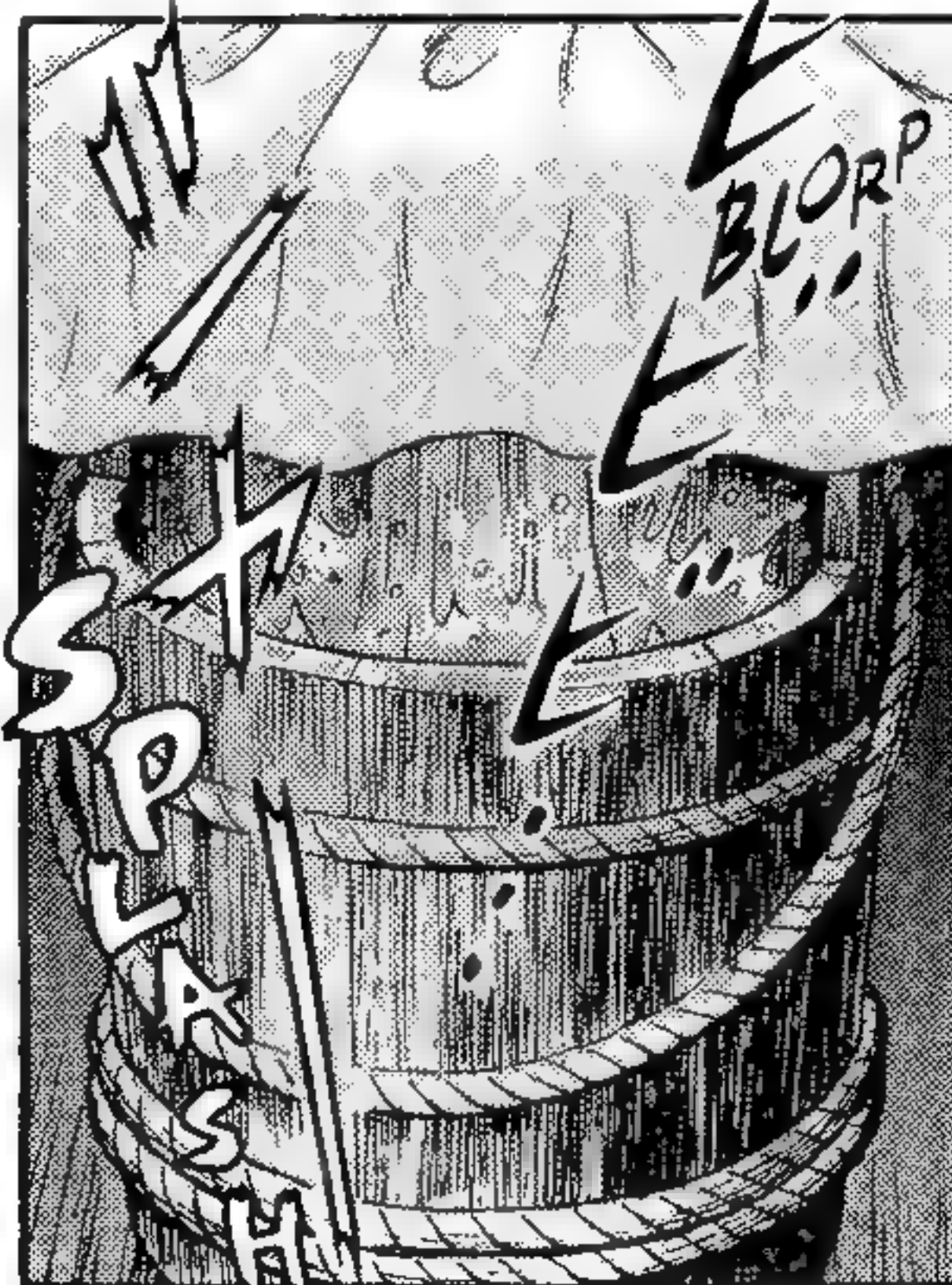
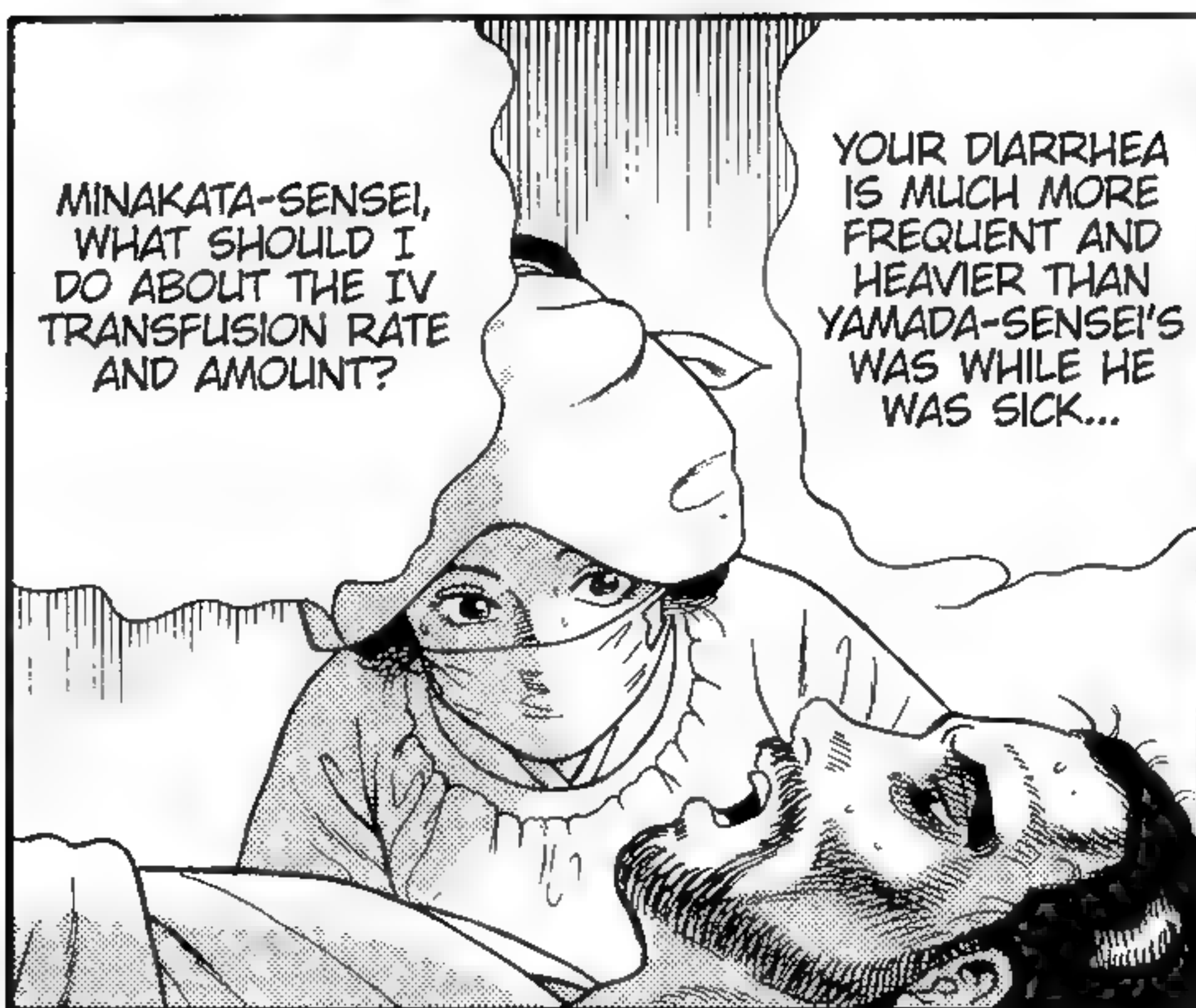








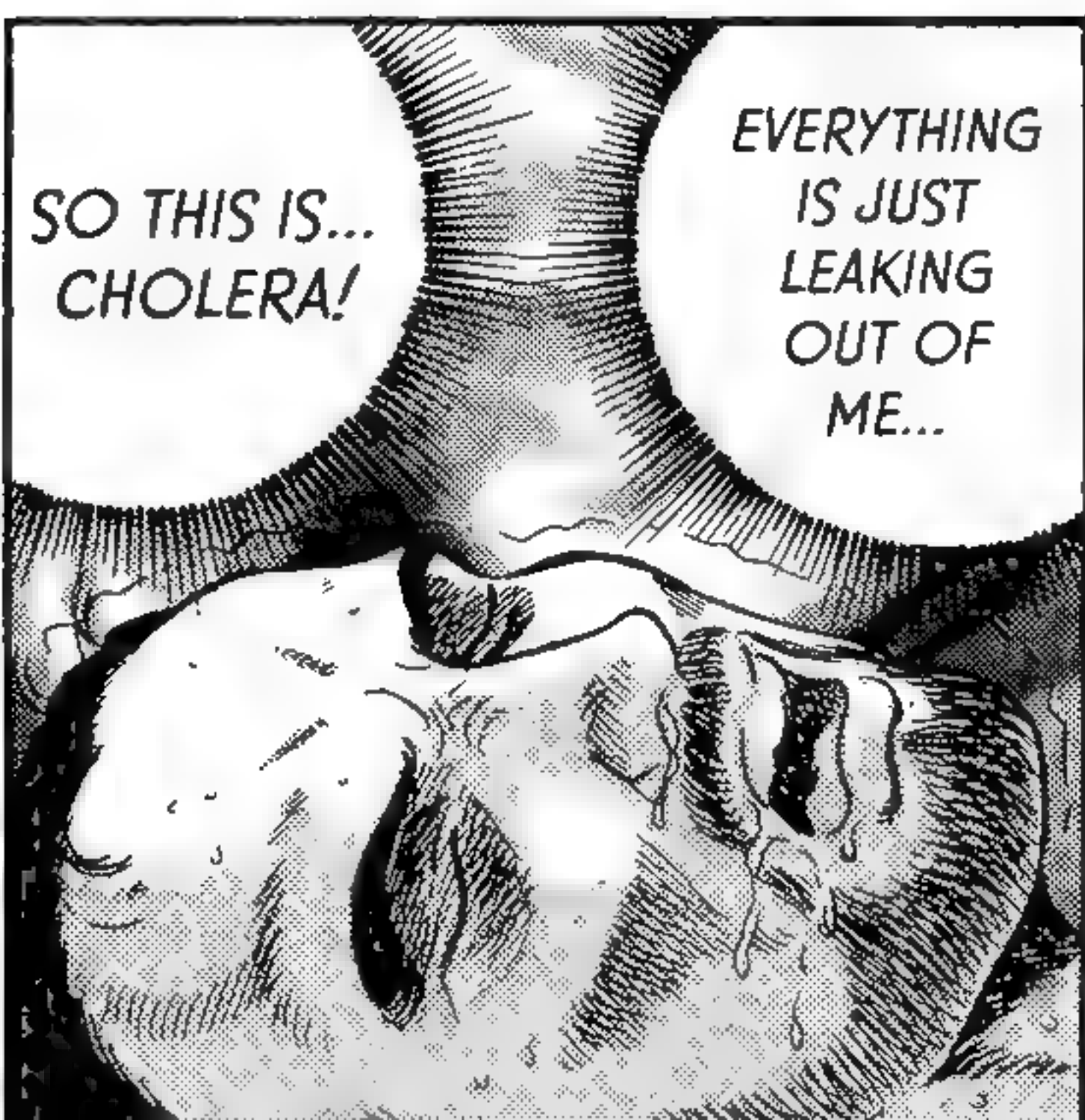
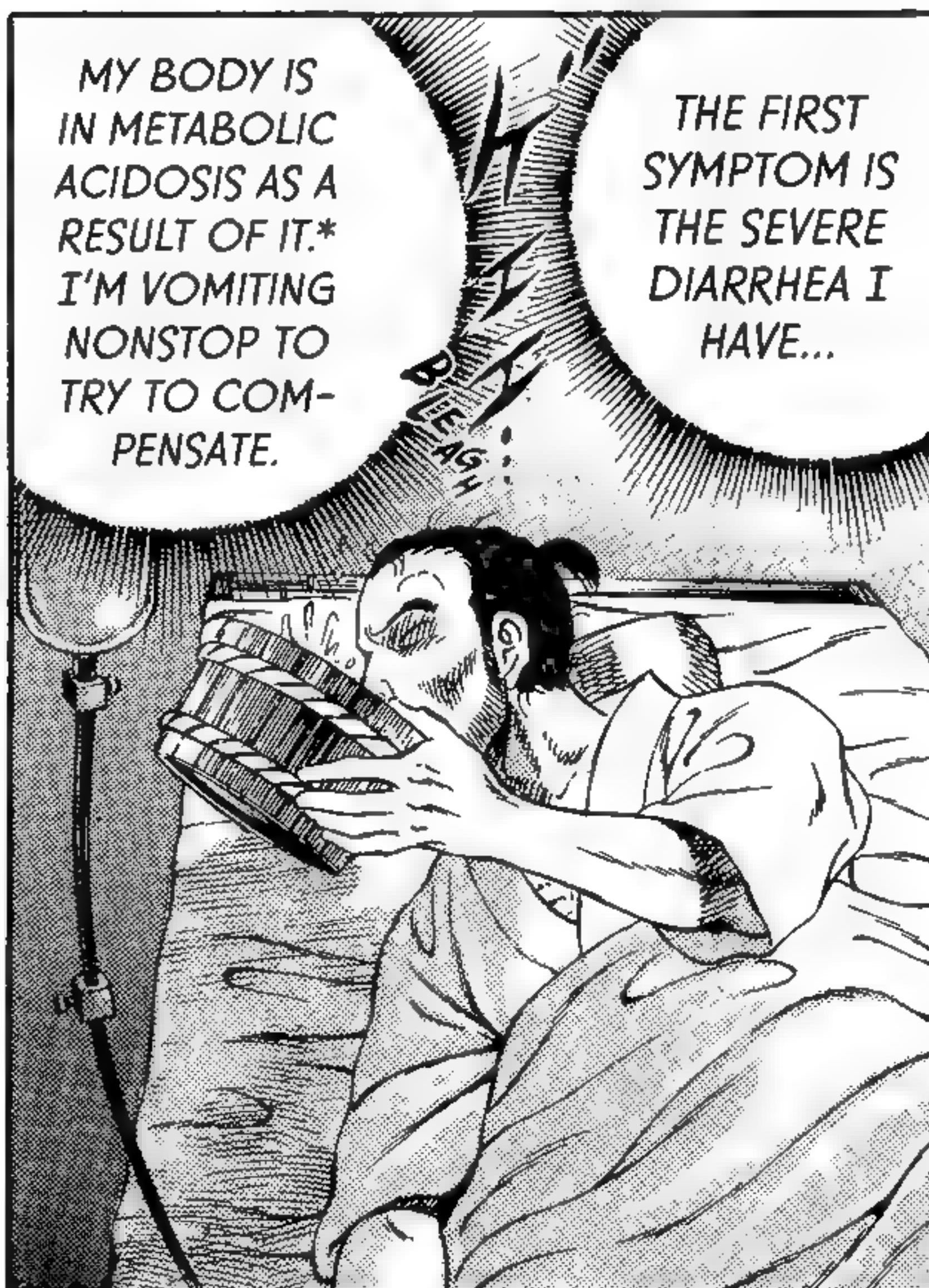
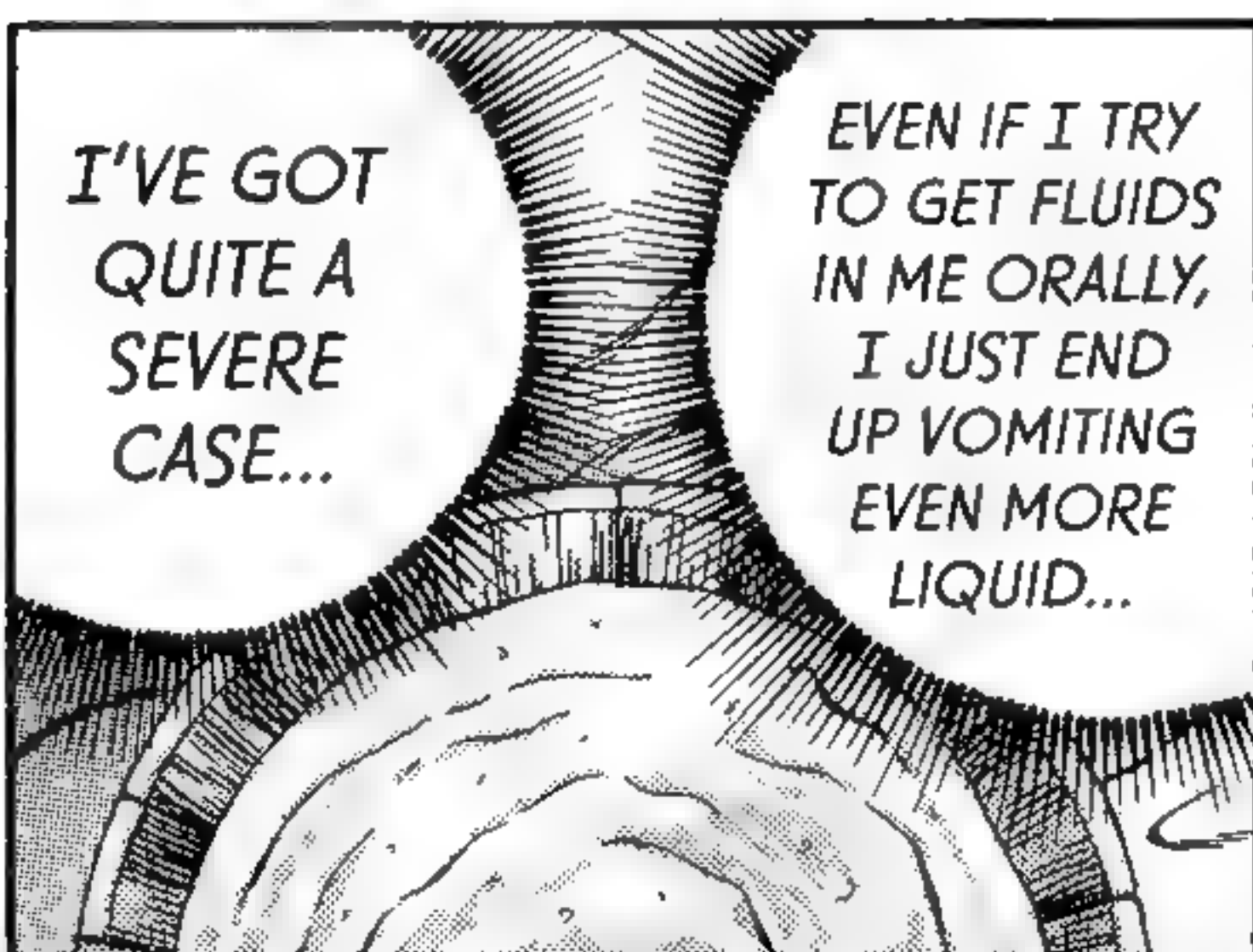












\*WHEN THE CHEMICAL BALANCE OF ACIDS AND BASES IN YOUR BLOOD GETS THROWN OFF, USUALLY WITH ACID LEVELS BECOMING ABNORMALLY HIGH.





THIS IS THE SHO-  
GUNATE'S WESTERN  
MEDICAL INSTITUTE.  
DON'T YOU THINK IT  
WOULD BE BEST FOR  
MINAKATA-SENSEI TO  
BE TREATED BY ONE  
OF THE DOCTORS  
HERE INSTEAD!?

SAKI, THINK  
THIS THROUGH.  
MINAKATA-SENSEI  
HAS FALLEN ILL,  
THUS YOUR JOB AS  
HIS ASSISTANT  
IS DONE.

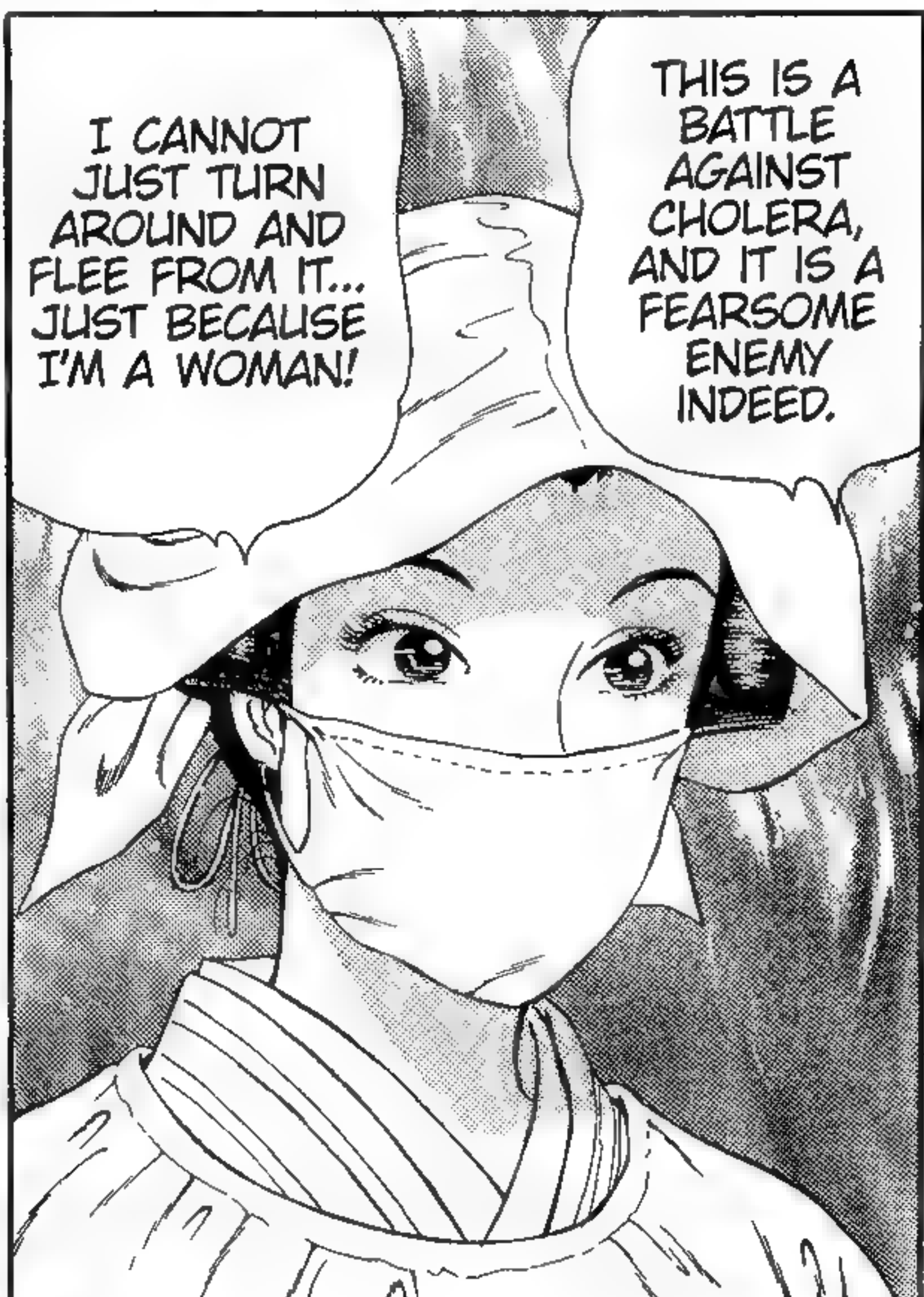


AND RIGHT NOW, THE  
DUTCH MEDICINE DOCTORS  
ARE WORKING ACROSS EDO  
WITH THE APPROVAL OF THE  
SHOGUNATE. THEY'RE USING  
THE METHODS THAT MINAKATA-  
SENSEI TAUGHT THEM TO CARE  
FOR PATIENTS STRICKEN  
WITH CHOLERA.

BROTHER...  
MINAKATA-SENSEI  
IS CURRENTLY  
FIGHTING CHOLERA  
WITH ALL THAT  
HE HAS...



SAKI,  
YOU...



I CANNOT  
JUST TURN  
AROUND AND  
FLEE FROM IT...  
JUST BECAUSE  
I'M A WOMAN!

THIS IS A  
BATTLE  
AGAINST  
CHOLERA,  
AND IT IS A  
FEARSOME  
ENEMY  
INDEED.



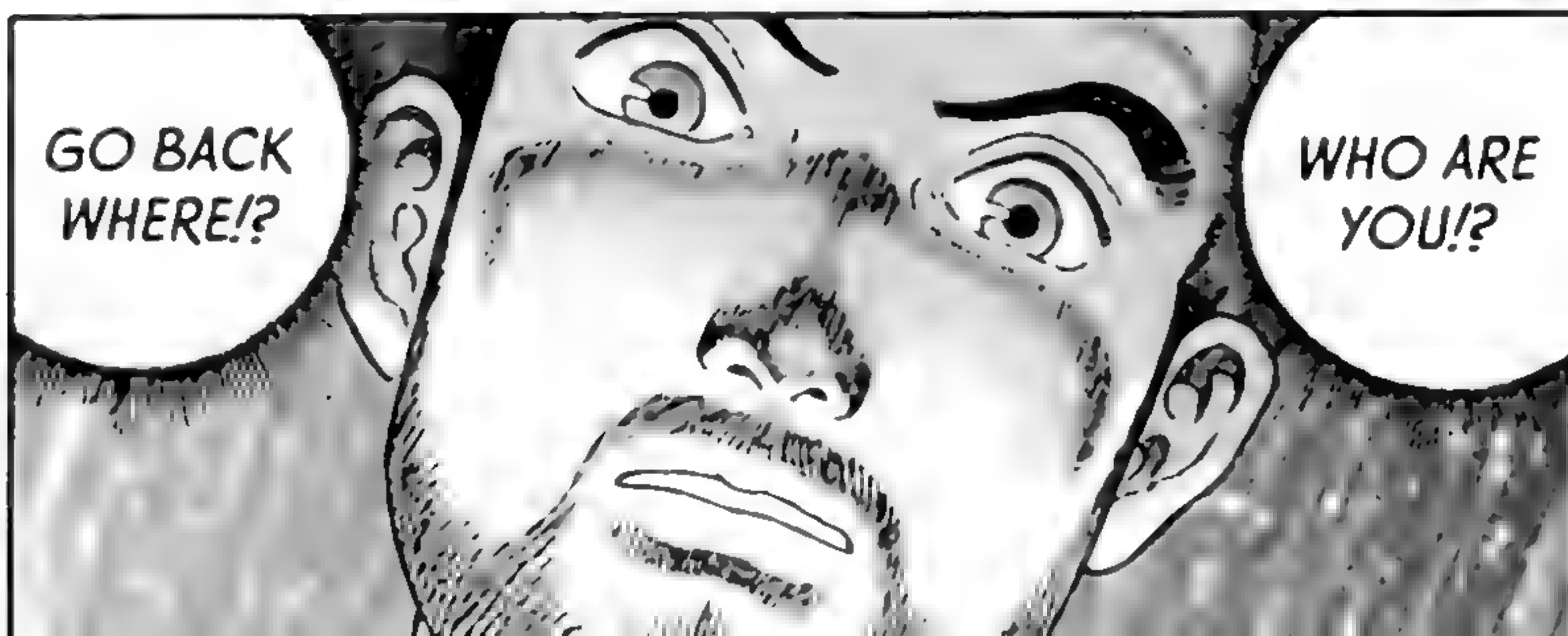
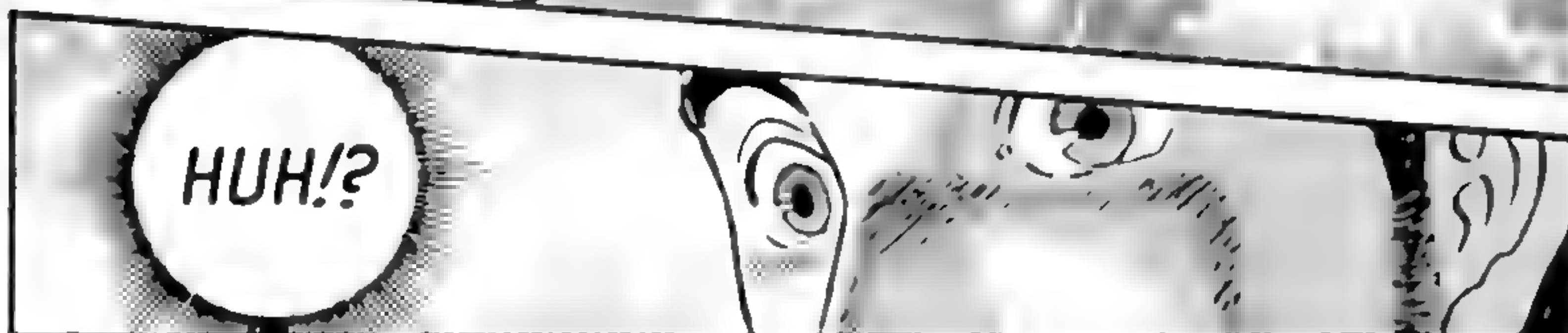
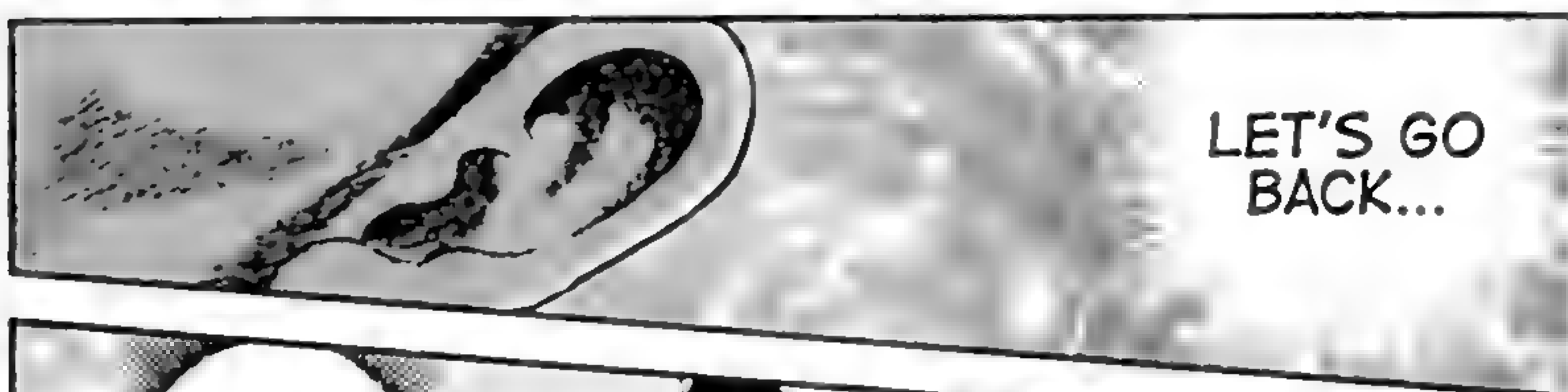
MY NAME IS  
TOMONAGA,  
AND I'M A  
STUDENT  
HERE.

SAKI-  
DONO!

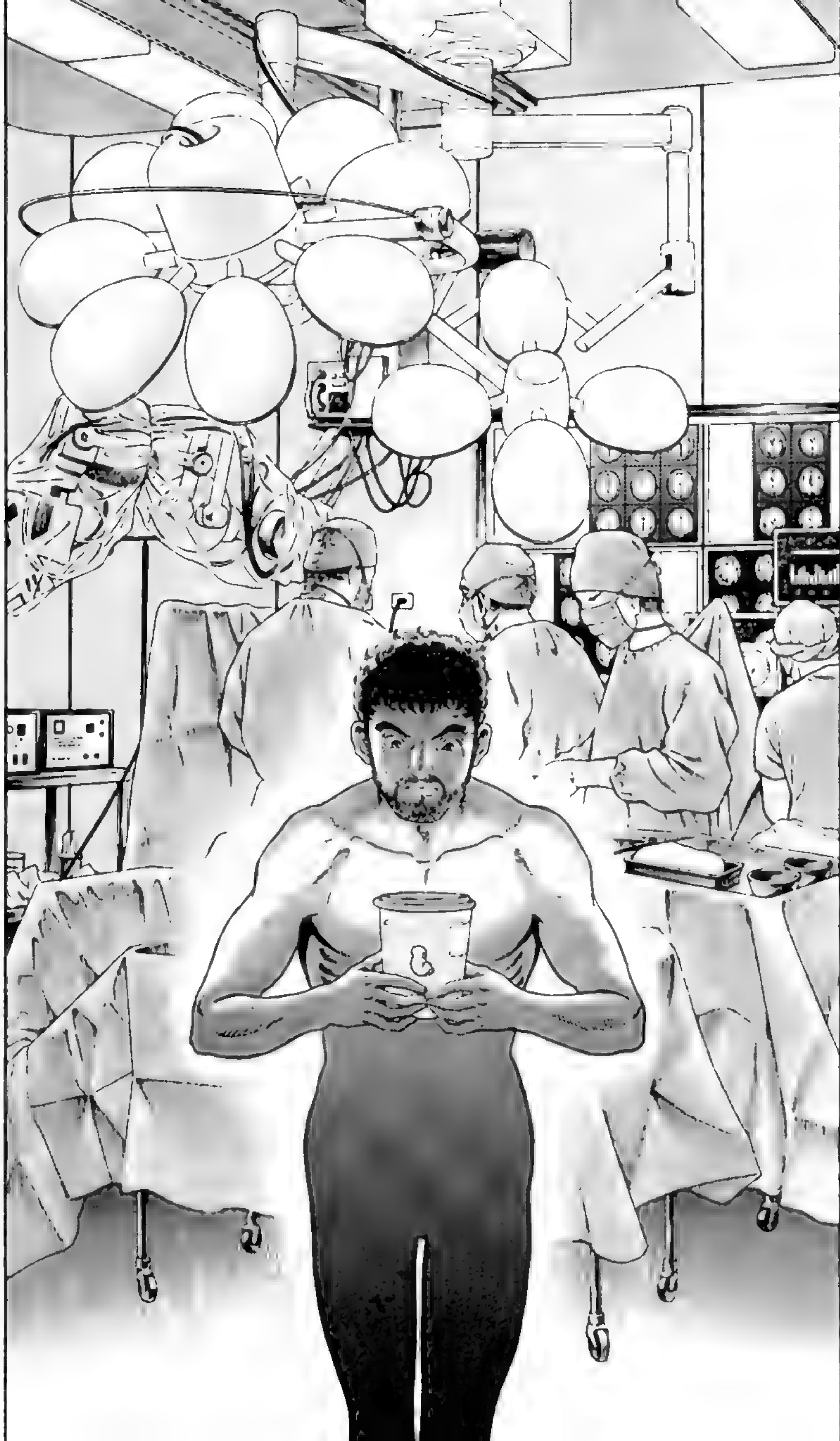




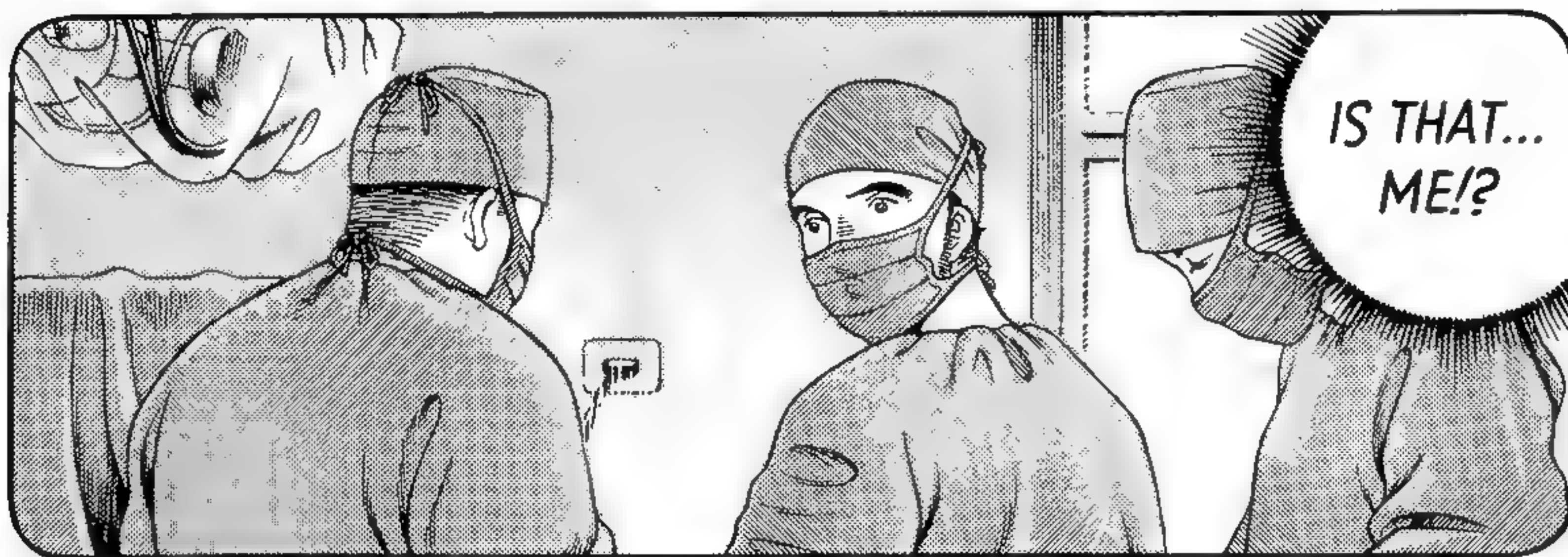




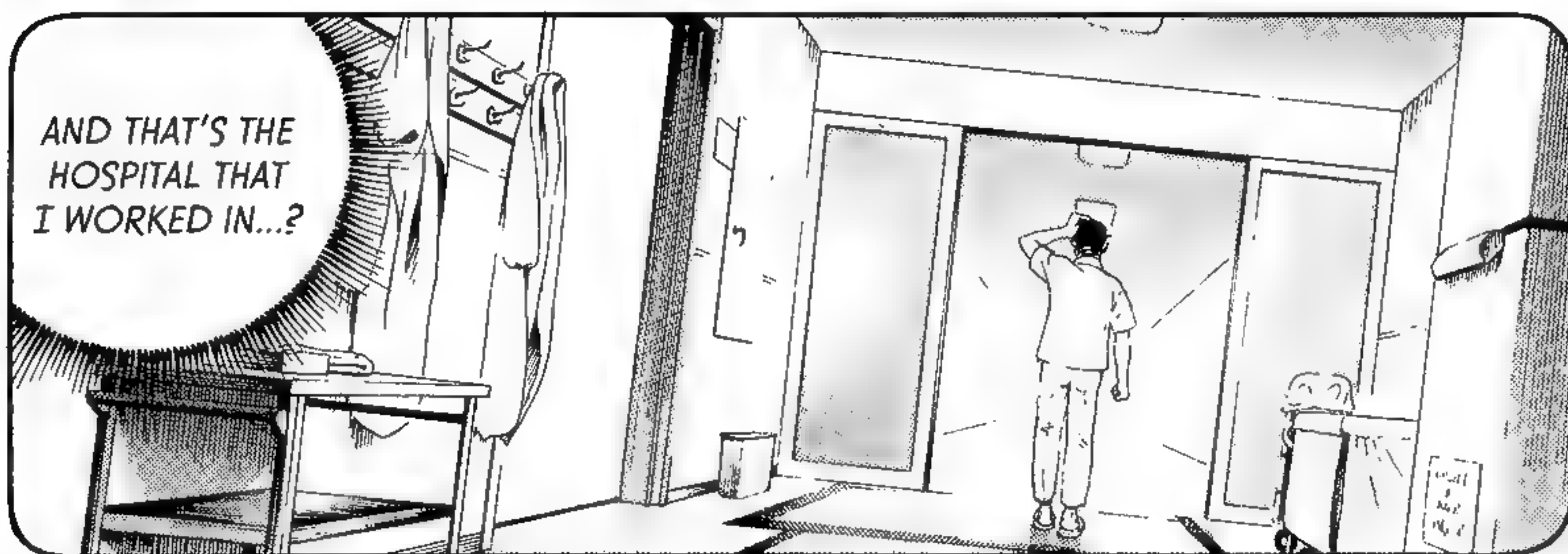








IS THAT...  
ME!?



AND THAT'S THE  
HOSPITAL THAT  
I WORKED IN...?



THIS IS DIFFERENT  
FROM HOW I  
REMEMBER IT...

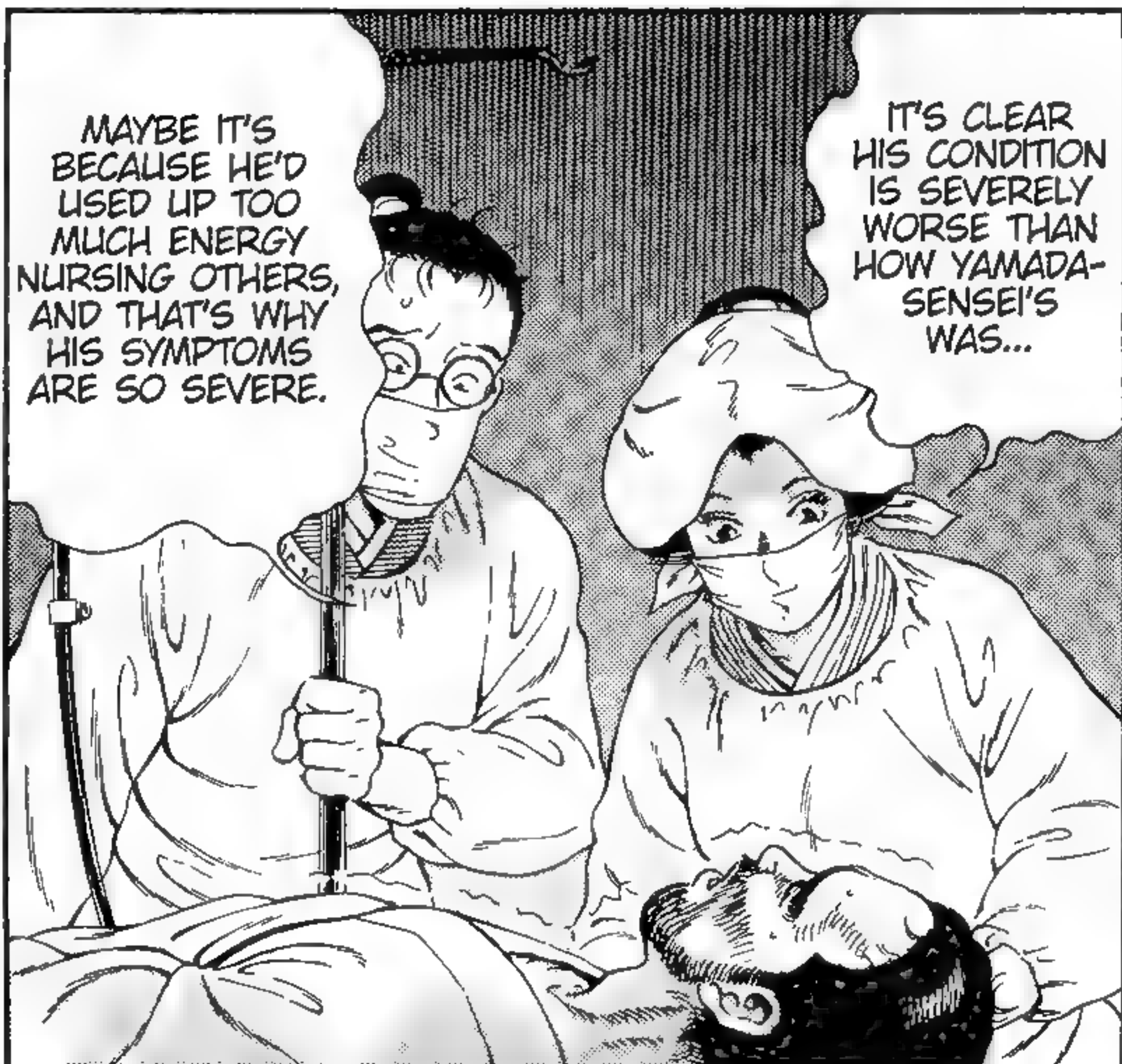
NO... THERE  
ARE MULTIPLE  
NURSES I DON'T  
RECOGNIZE.



THEN...  
THE VERSION  
OF "ME" HERE  
IN THE EDO  
PERIOD...

COULD I'VE STILL  
CONTINUED TO  
EXIST OVER IN  
THAT WORLD...?







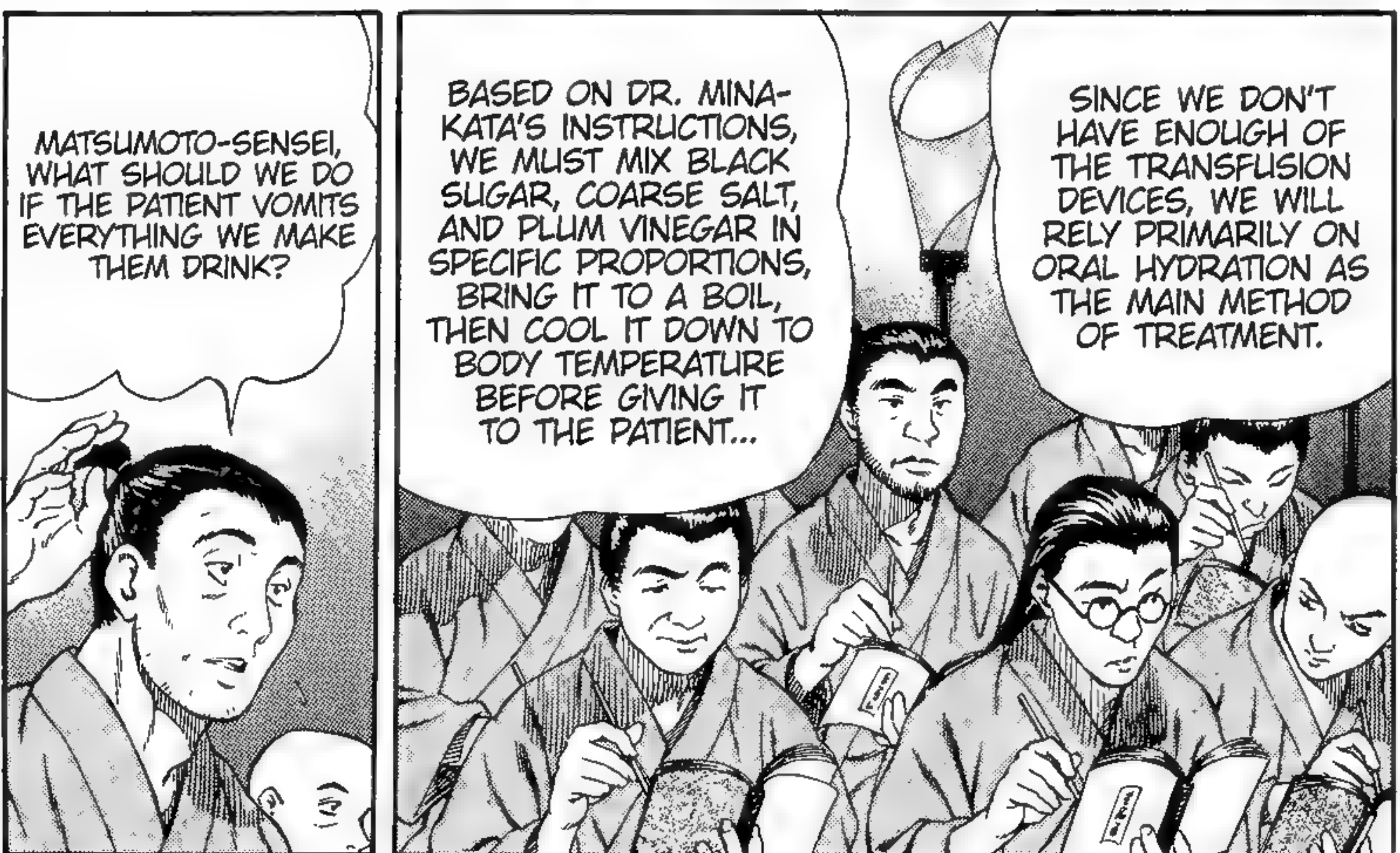
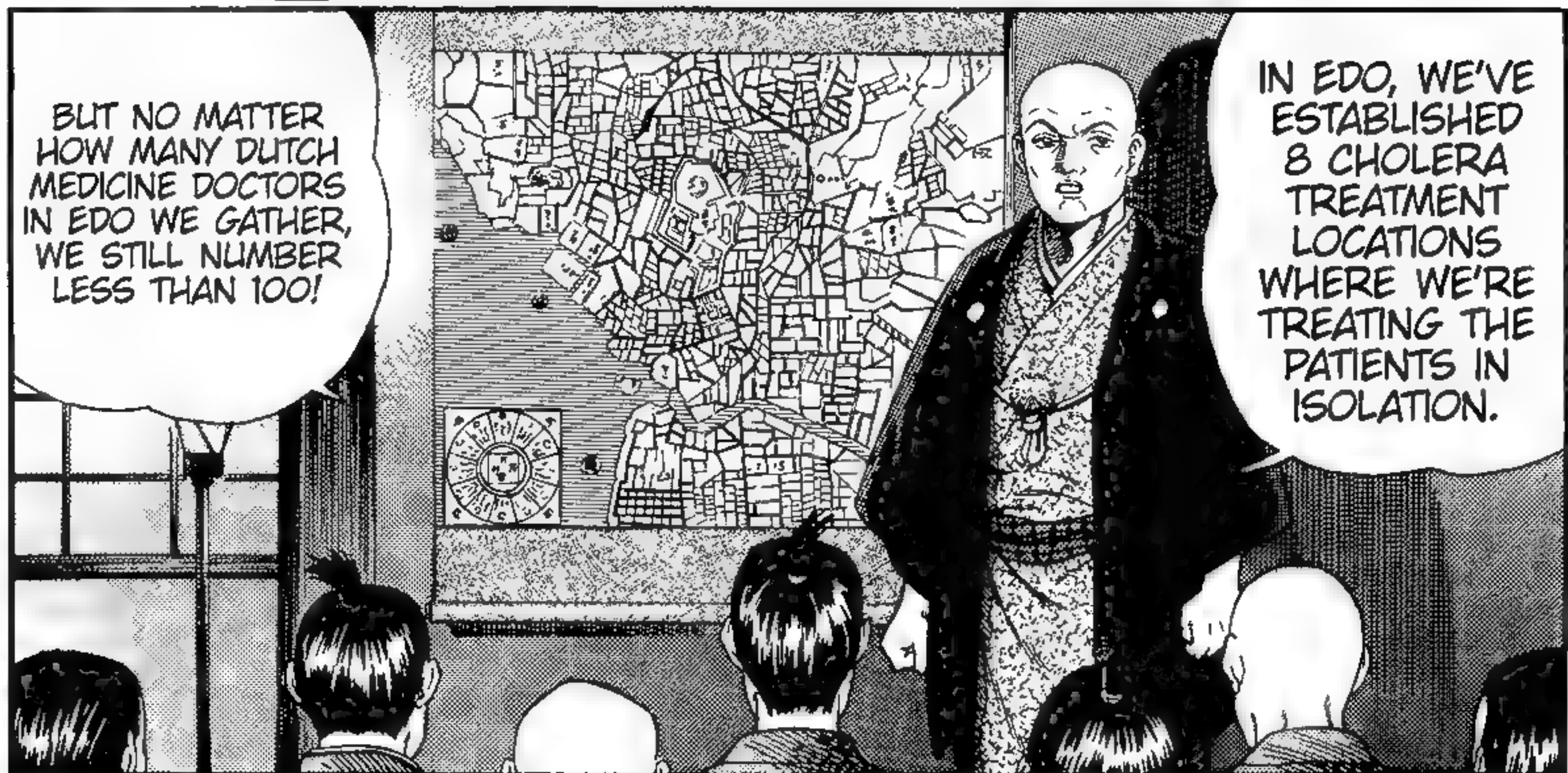


PLACE THE  
CONTAINERS WITH  
THE BODILY WASTE  
INTO THE HOLE,  
COVER THEM WITH  
A THICK LAYER OF  
QUICKLIME, AND  
BURY THEM!

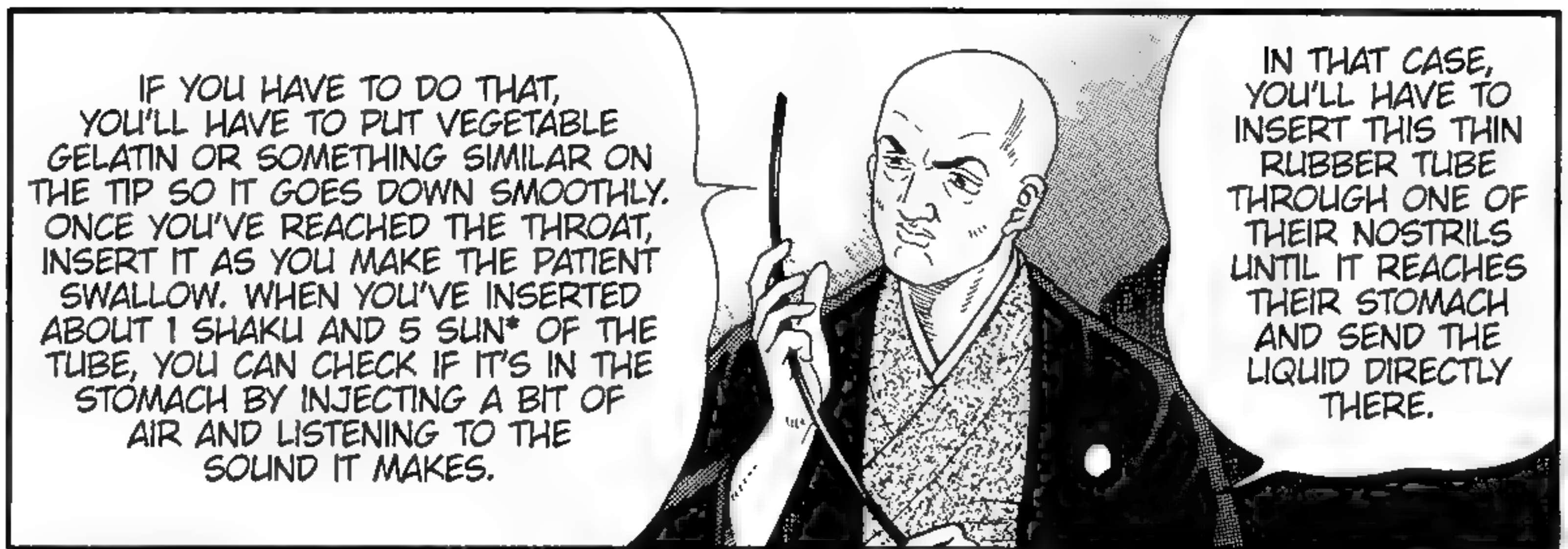


BRING  
ALL THE  
PATIENTS  
INTO THE  
TENT!

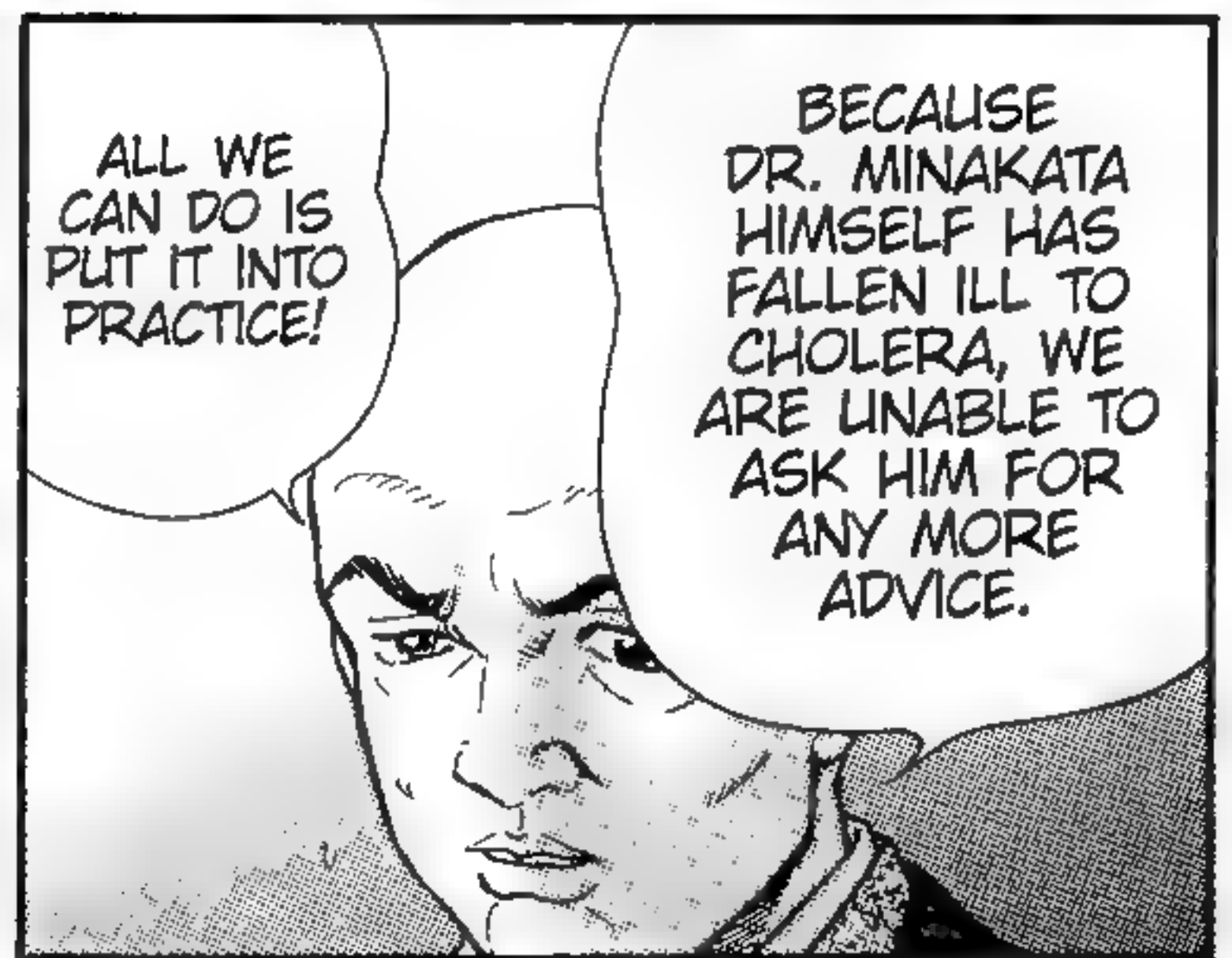






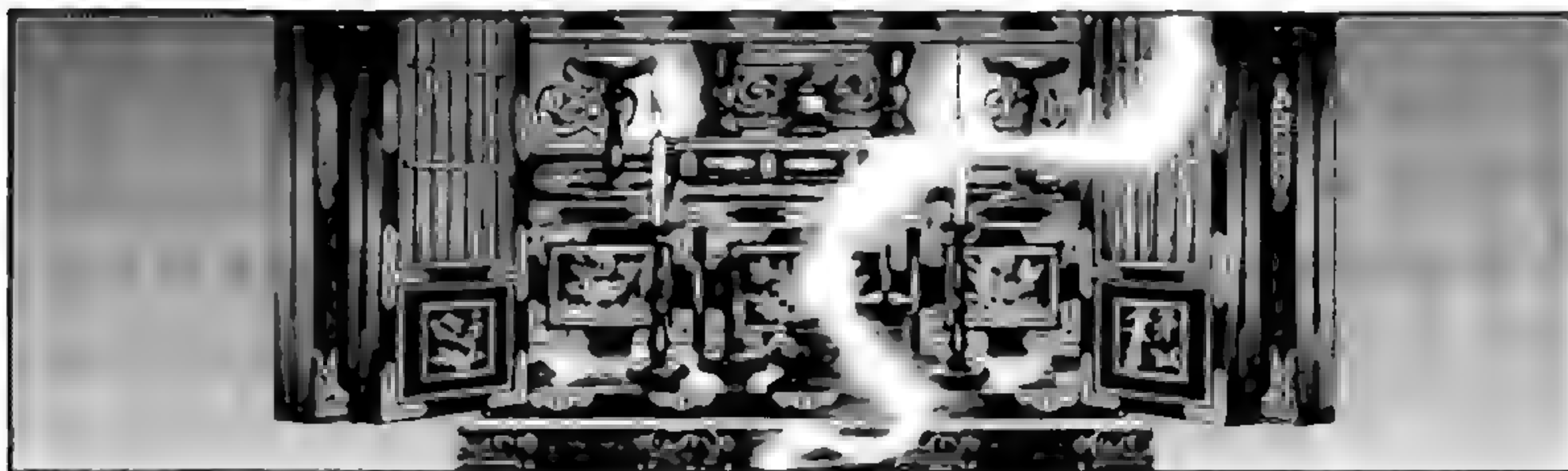


\*ABOUT 45.45CM.

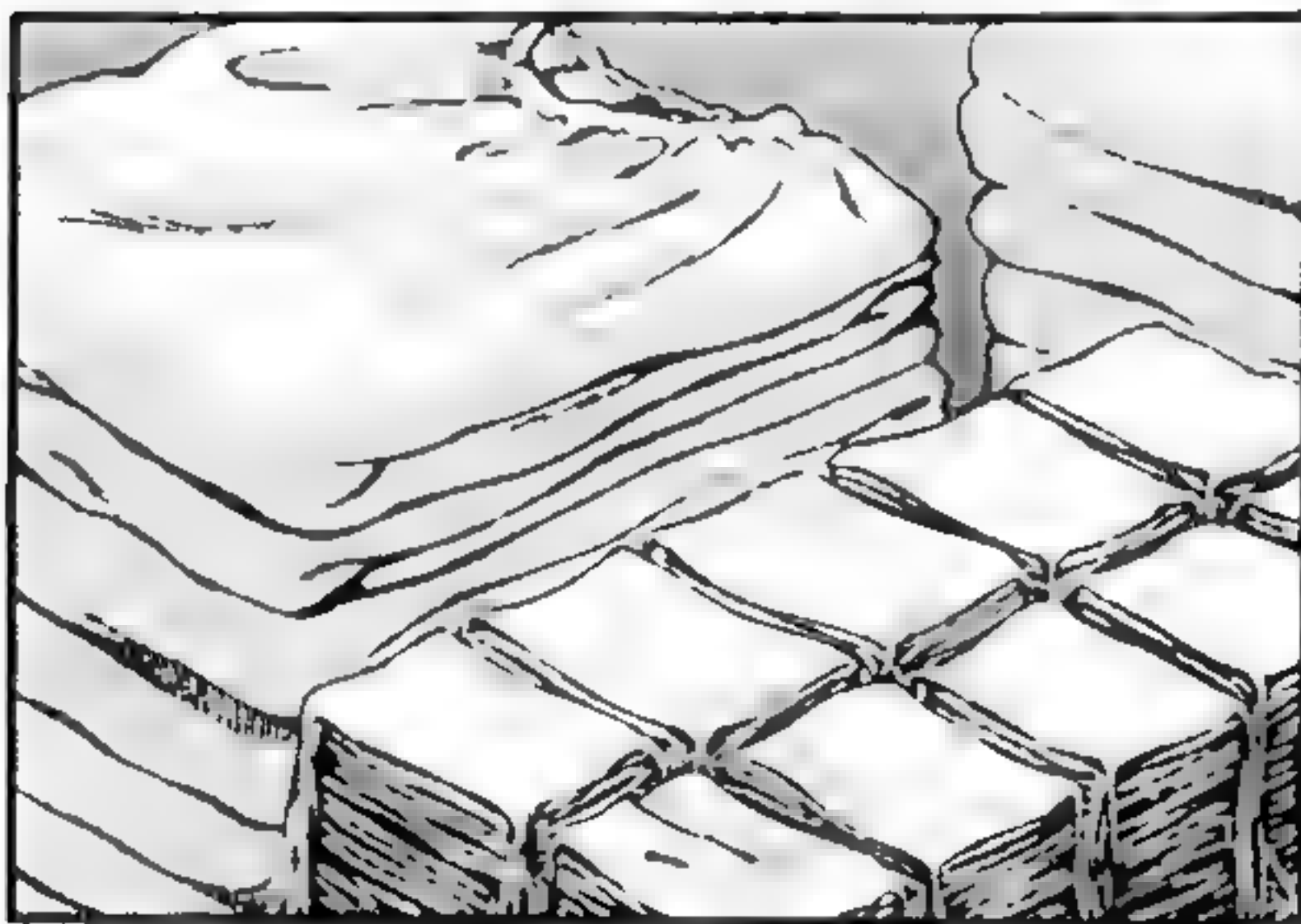


\*LOWER GOVERNMENT POSITION HATAMOTO SAMURAI.

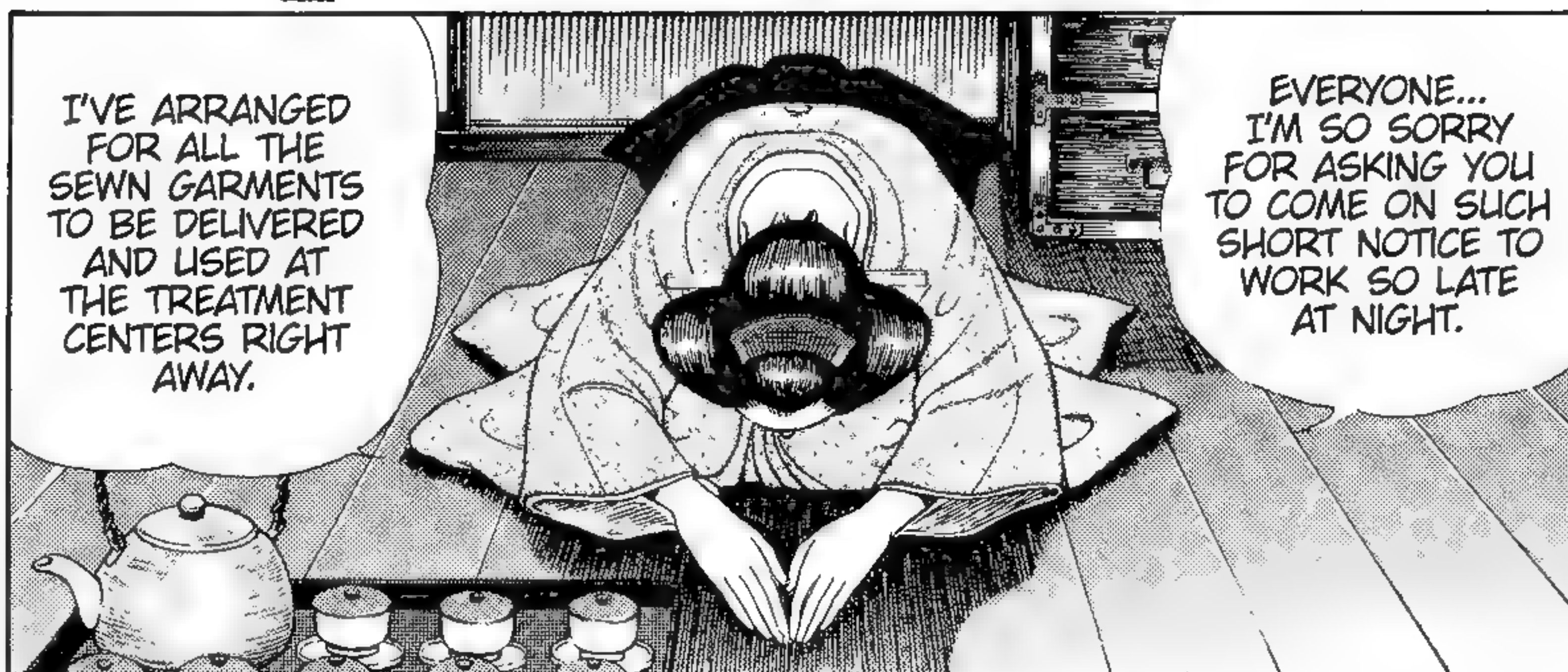




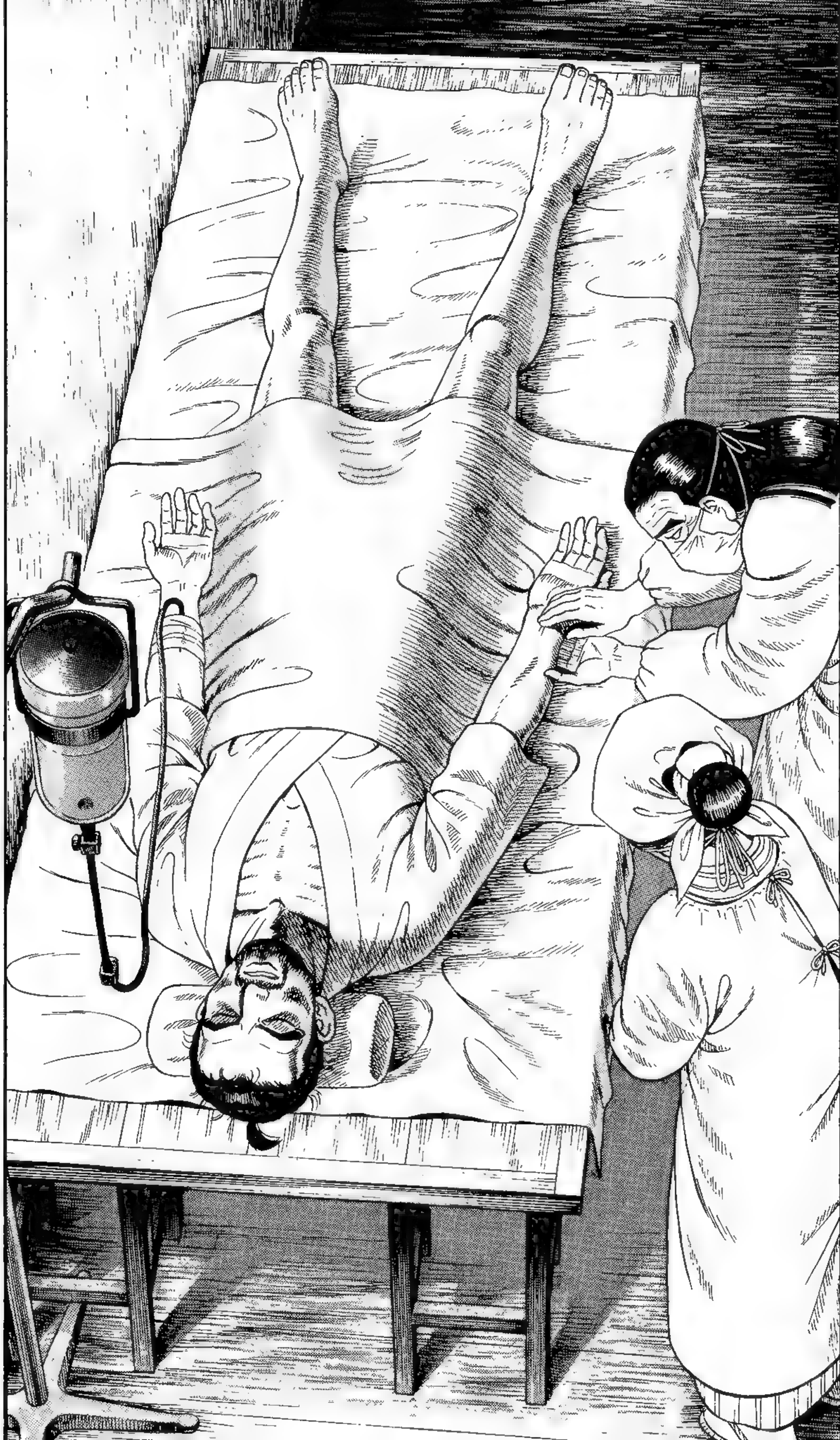








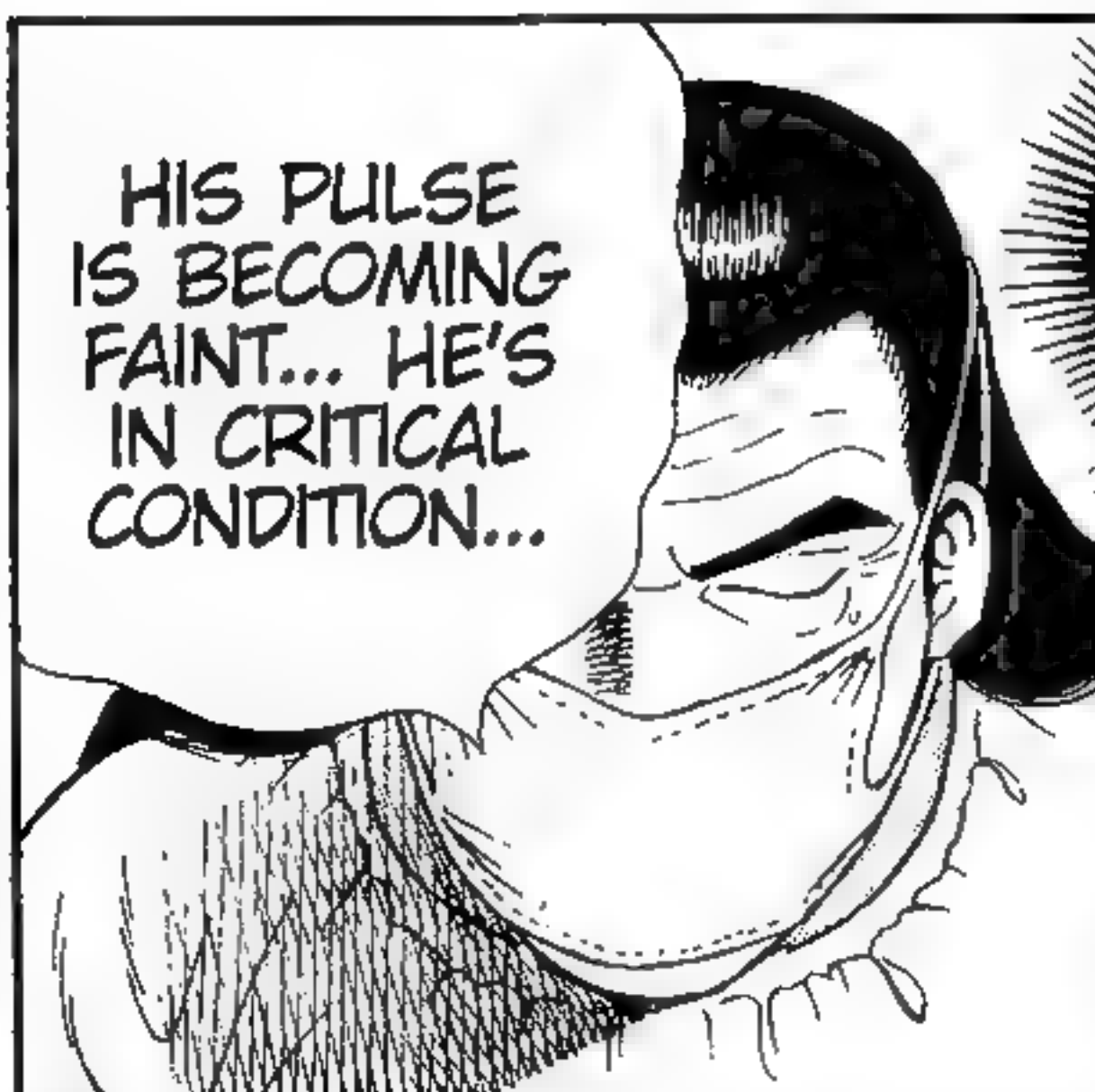








!



HIS PULSE  
IS BECOMING  
FAINT... HE'S  
IN CRITICAL  
CONDITION...



BA...  
DUM



WITH THE  
AMOUNT OF  
EXPERIENCE  
I HAVE.

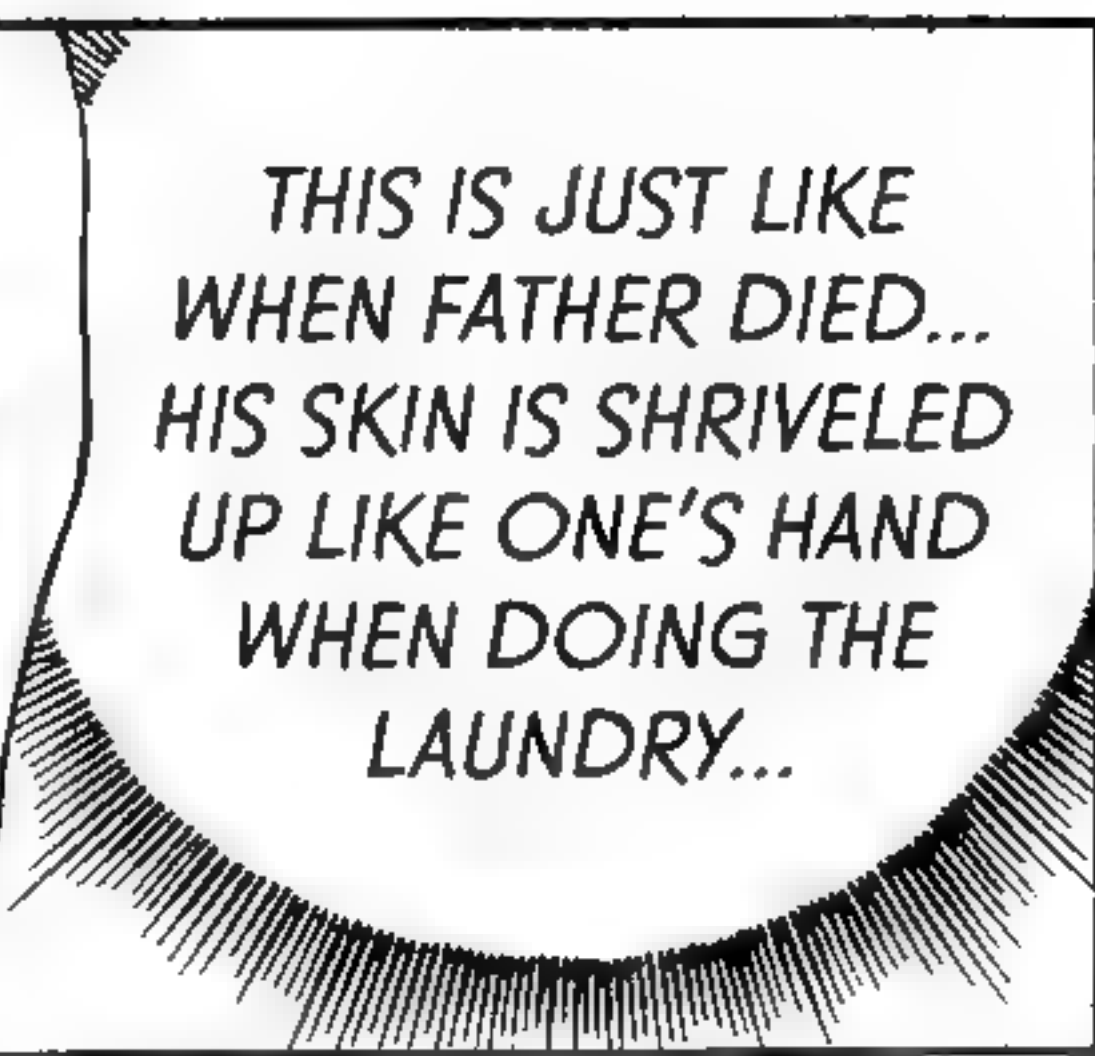
REGRETFULLY,  
I KNOW OF NO  
EFFECTIVE WAY  
TO TREAT THIS...



OGATA-  
SENSEI, IS  
THERE ANY  
WAY TO SAVE  
MINAKATA-  
SENSEI?



OH, I KNOW!  
IF HE'S STILL NOT  
GETTING ENOUGH  
FLUIDS, WHY DON'T  
I TRY INCREASING  
THE NUMBER OF  
INTRAVENOUS  
DRIPS...?



THIS IS JUST LIKE  
WHEN FATHER DIED...  
HIS SKIN IS SHRIVELED  
UP LIKE ONE'S HAND  
WHEN DOING THE  
LAUNDRY...

BA...  
DUM...





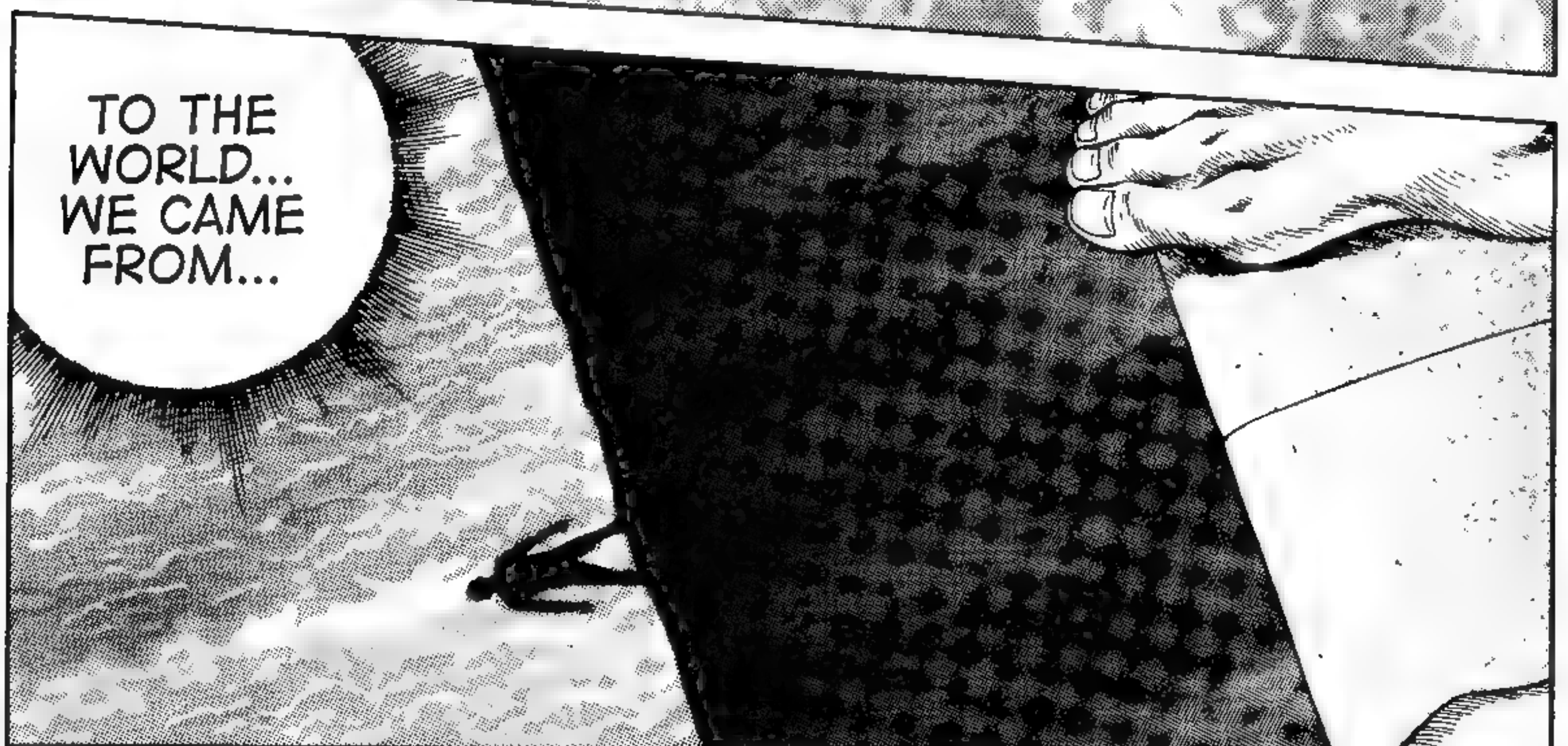
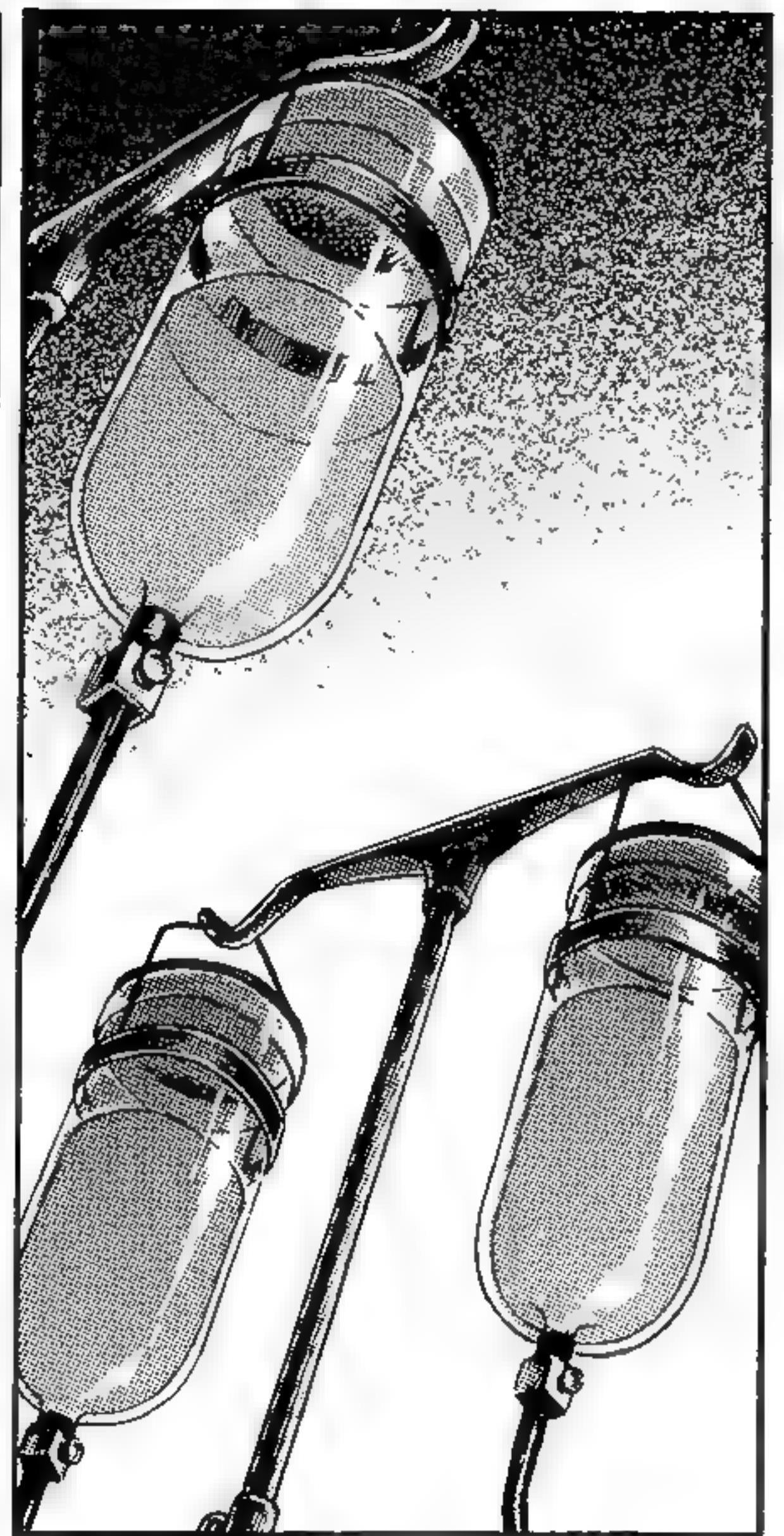
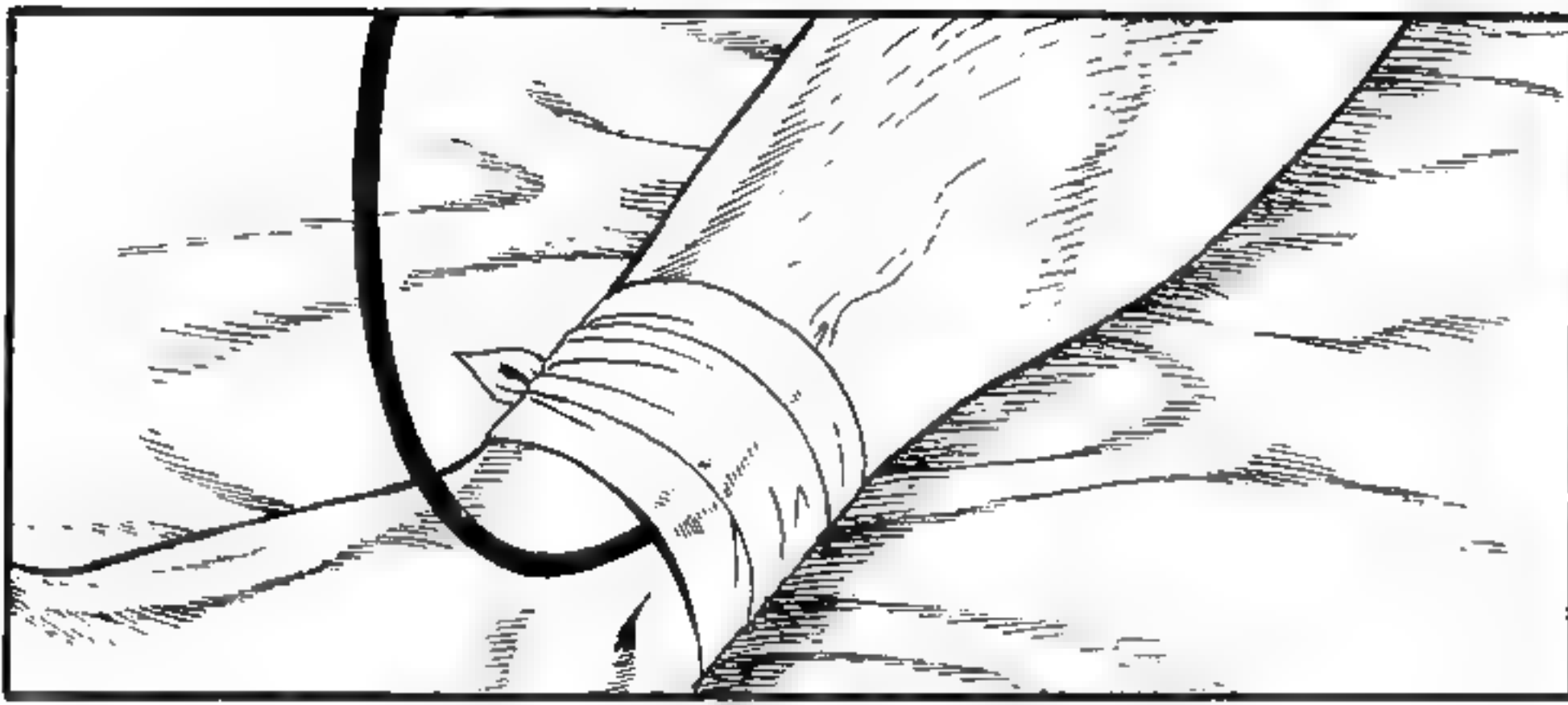


BA...  
DUM...

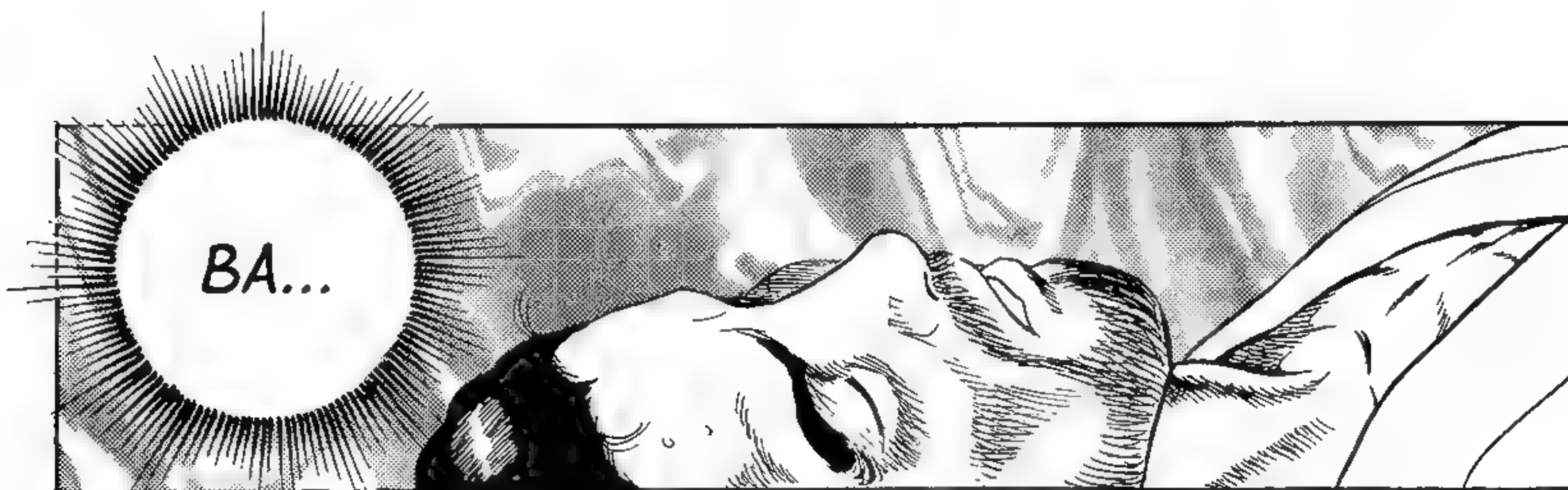
BA...  
DUM...

BA...  
DUMP





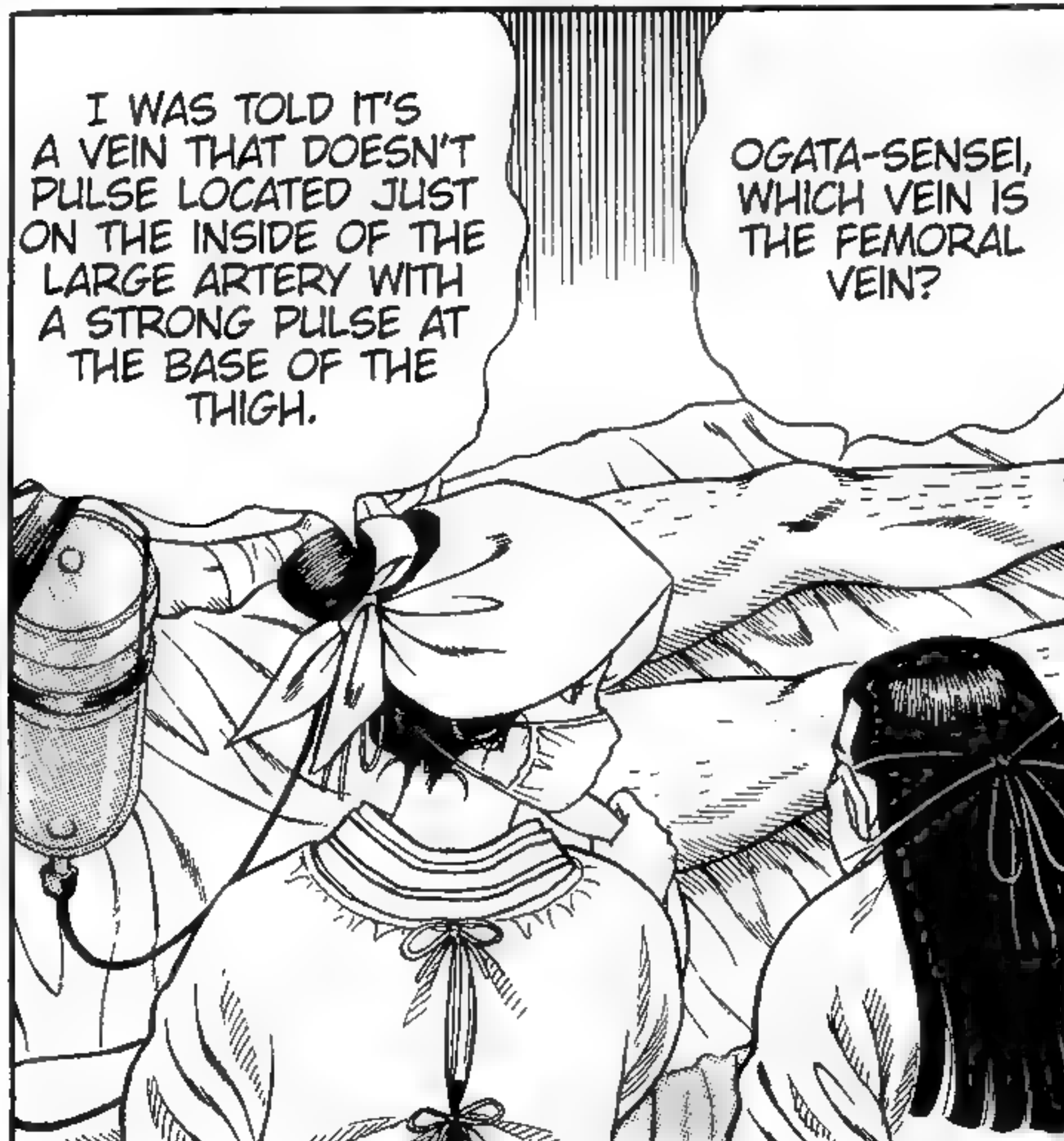
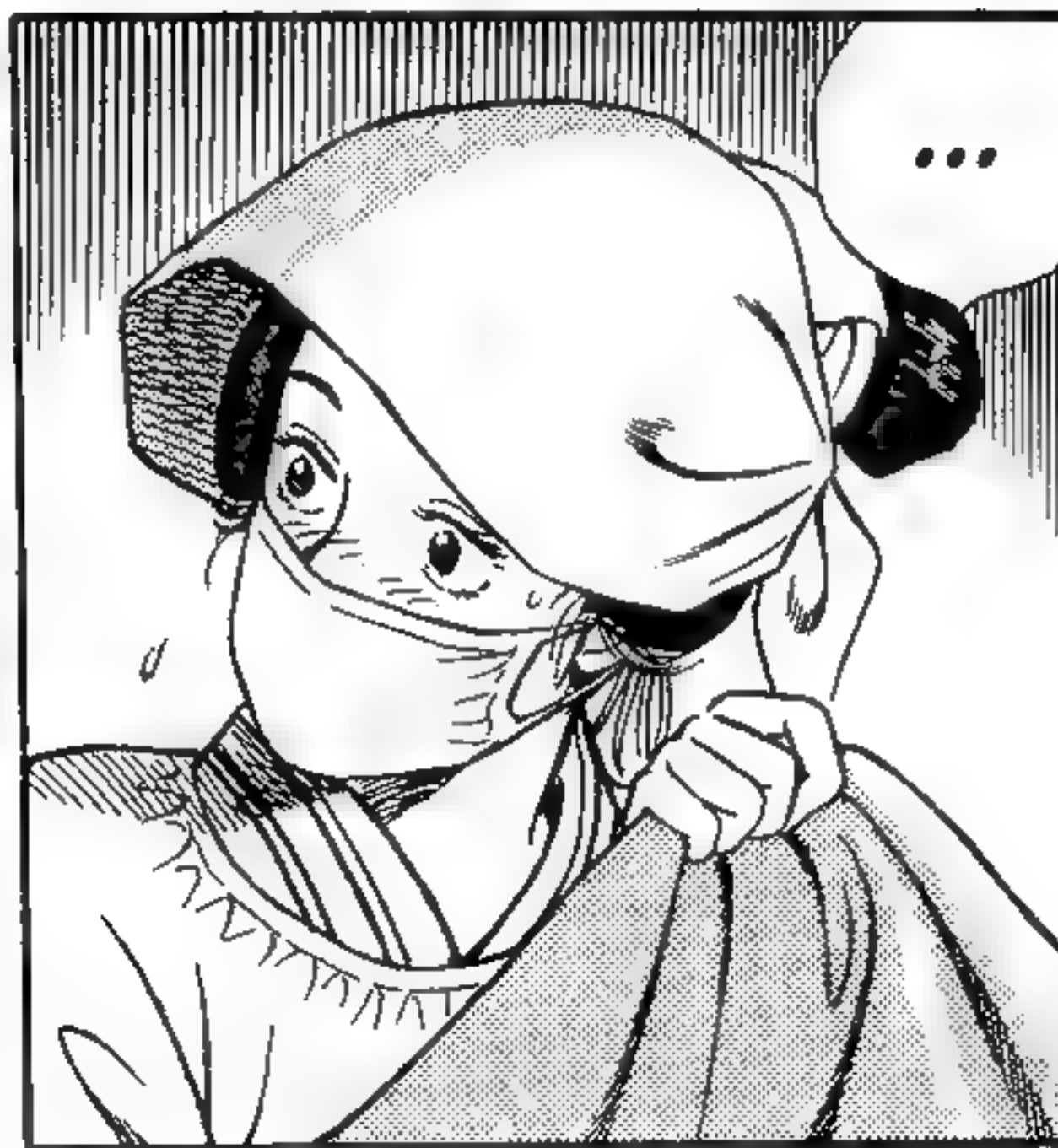
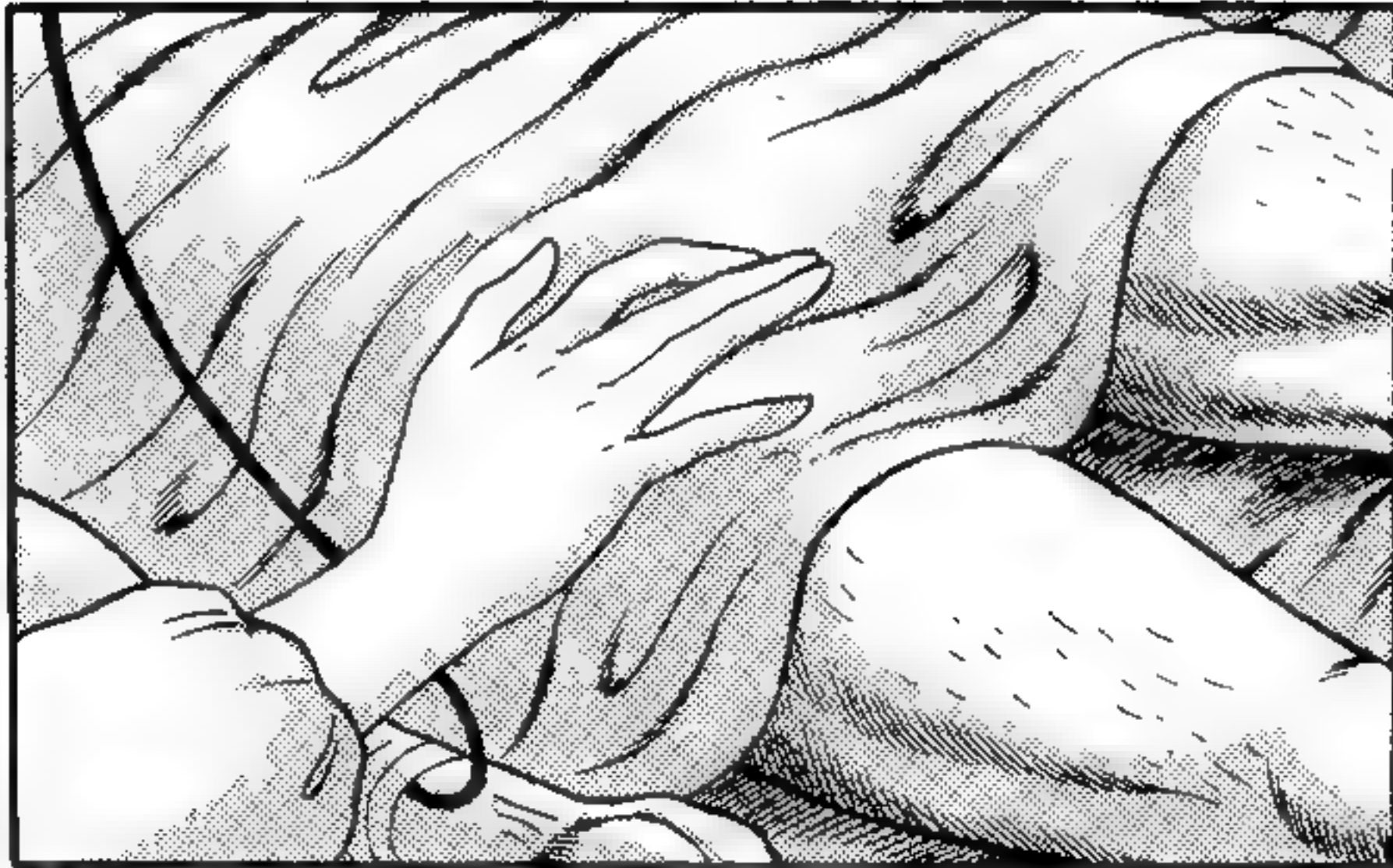
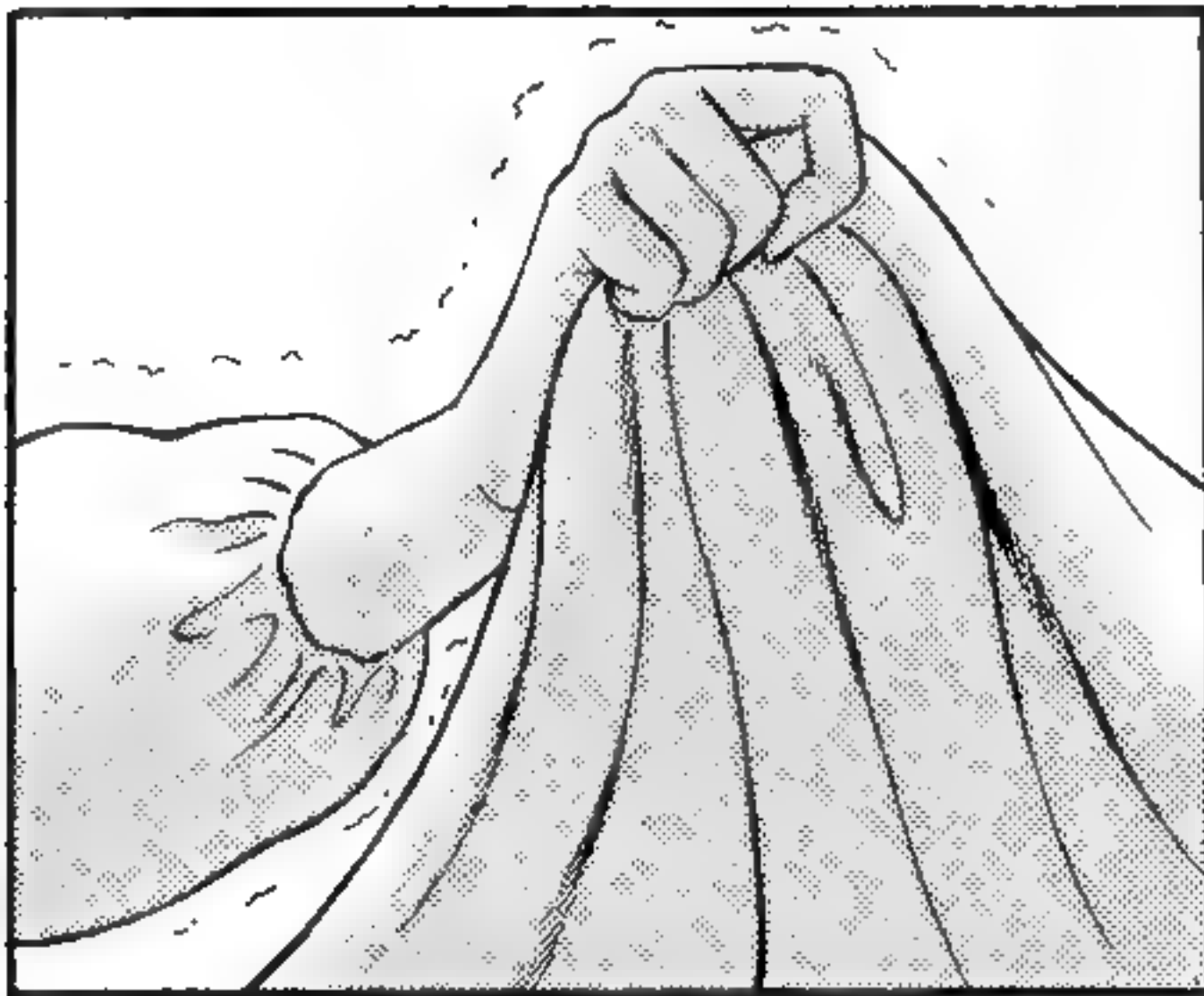




THERE'S A VEIN CALLED THE FEMORAL VEIN. IT'S LOCATED AT THE BASE OF THE THIGHS.

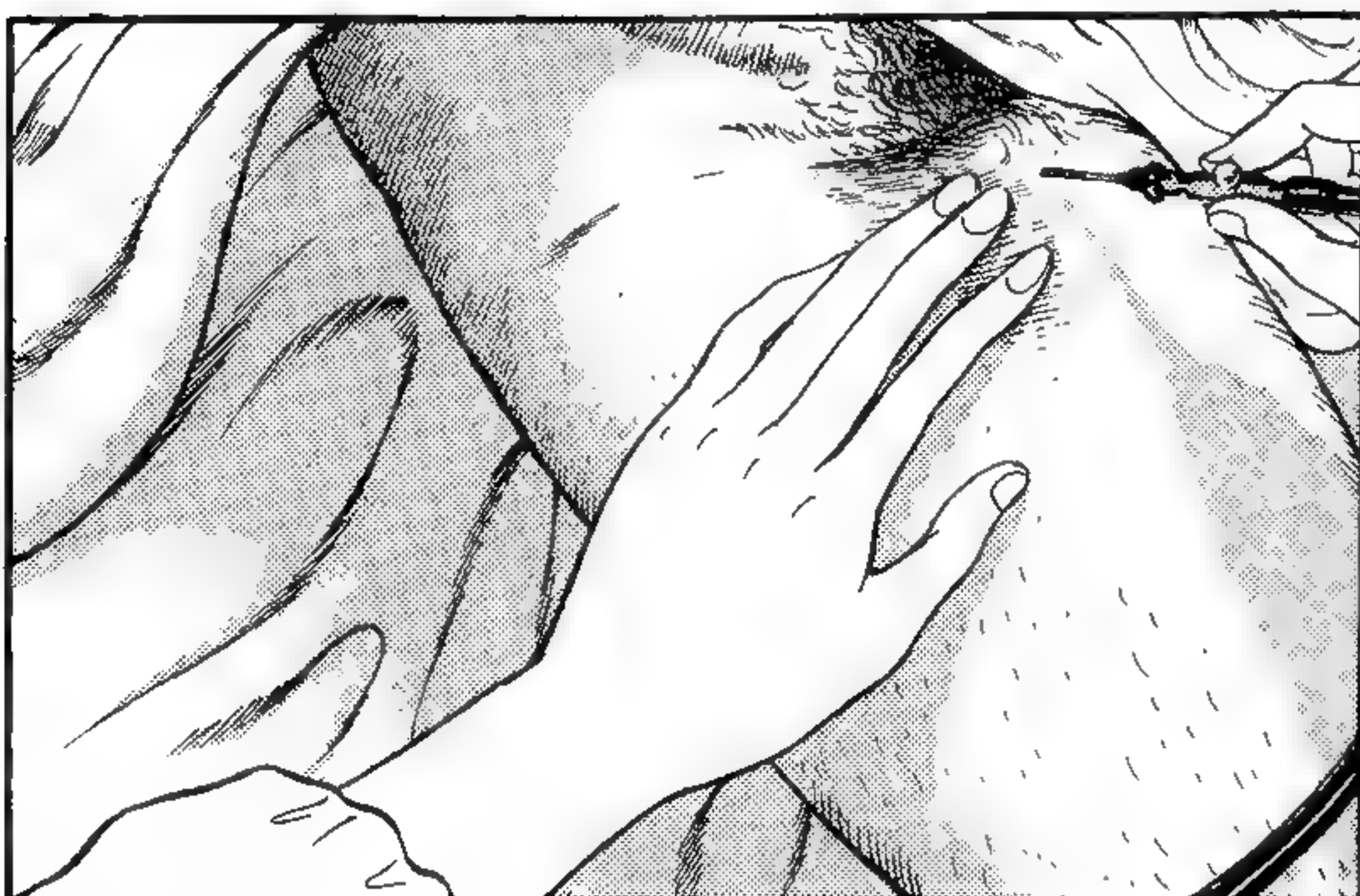






I WAS TOLD IT'S  
A VEIN THAT DOESN'T  
PULSE LOCATED JUST  
ON THE INSIDE OF THE  
LARGE ARTERY WITH  
A STRONG PULSE AT  
THE BASE OF THE  
THIGH.









TO  
THE ERA  
I CAME  
FROM...



TO THE  
WORLD  
I CAME  
FROM...



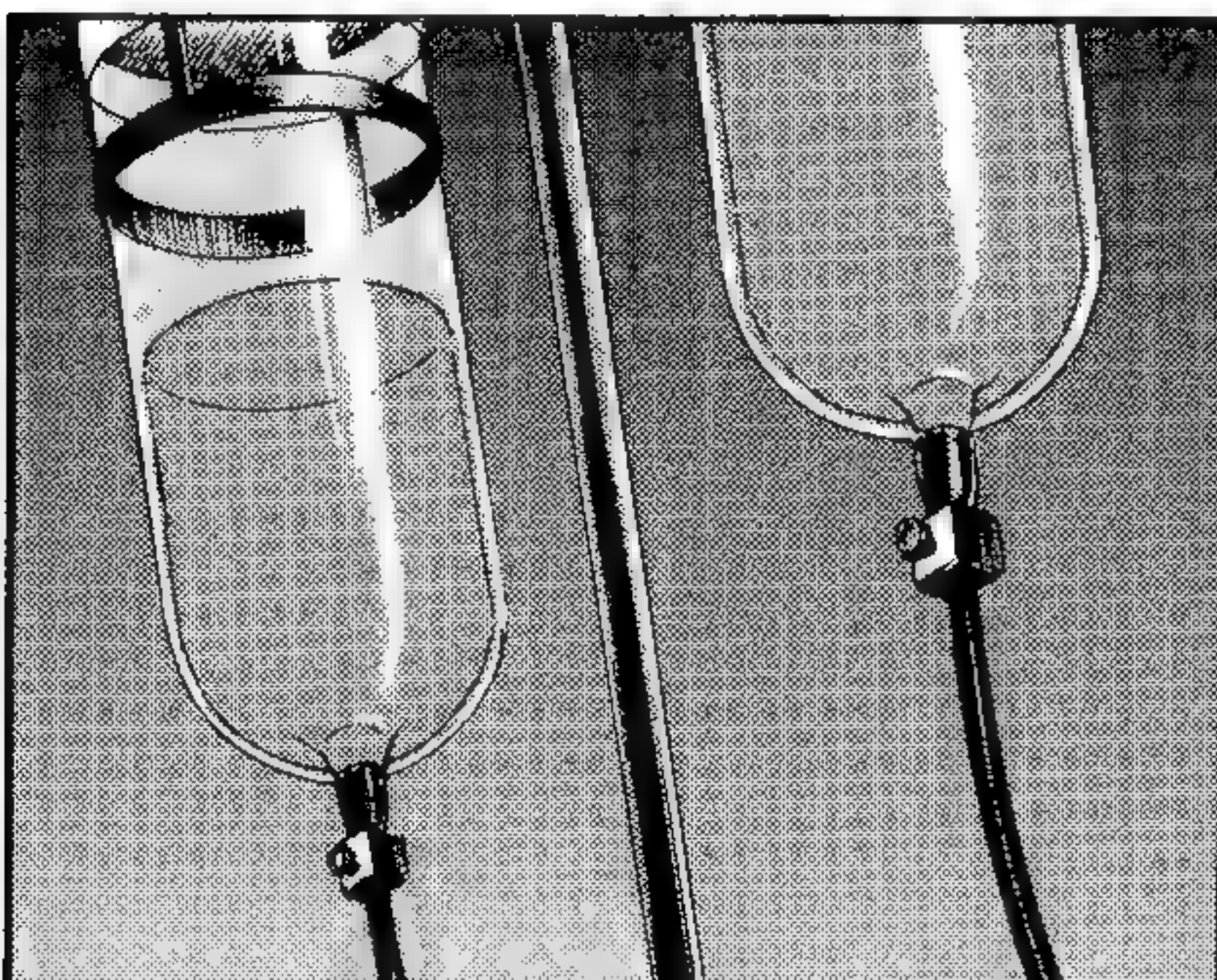
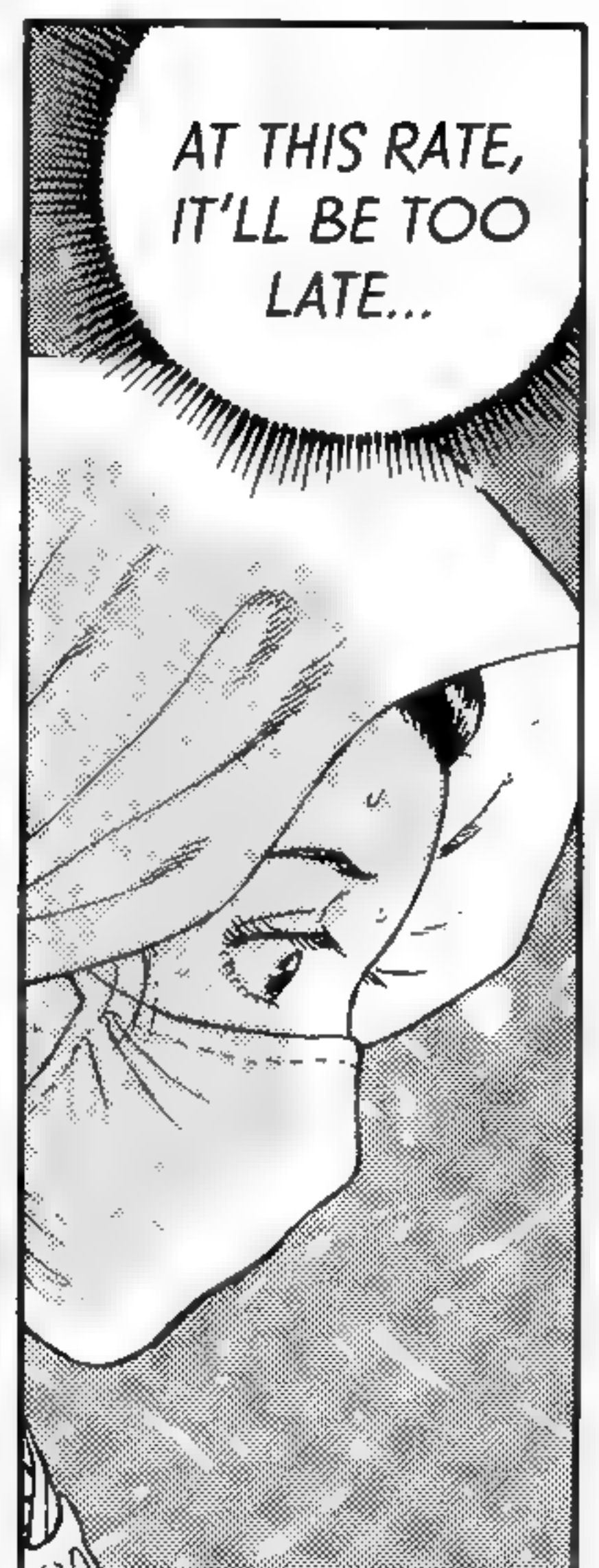
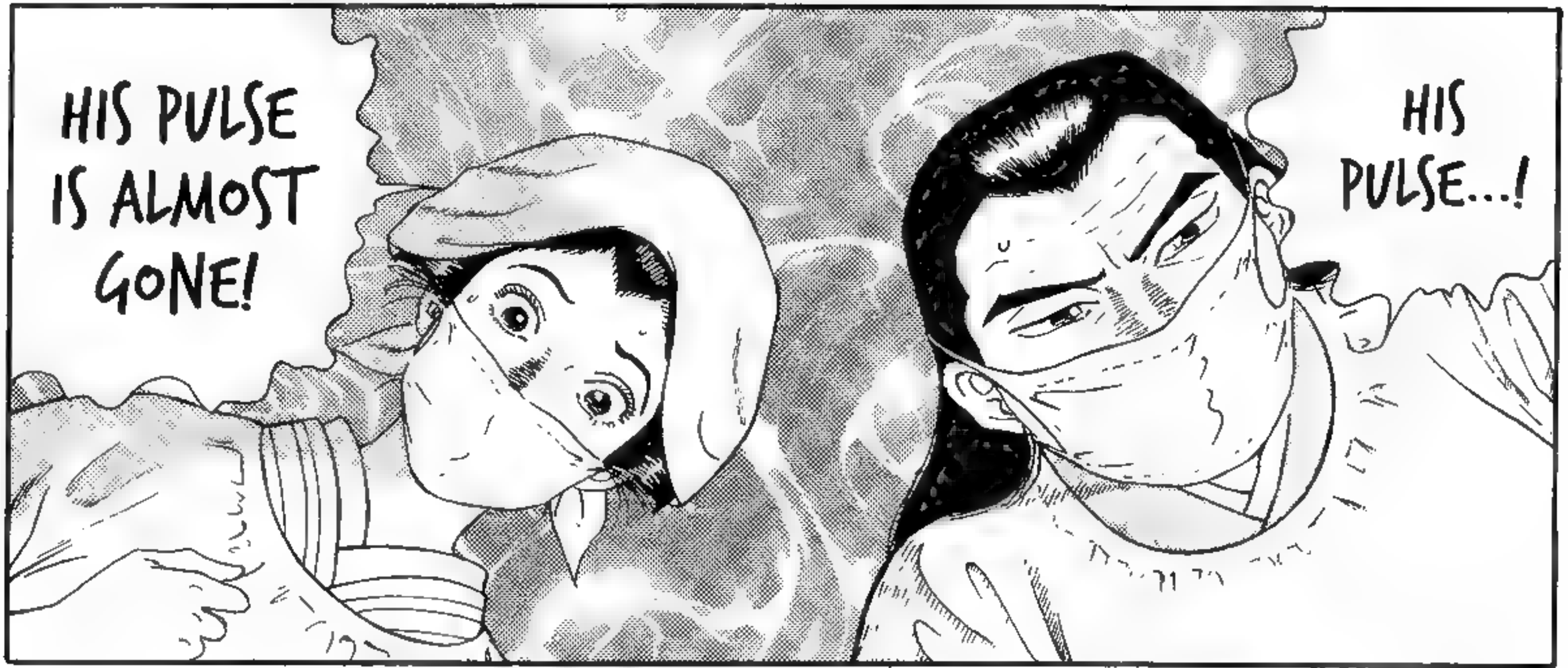
NOW I'LL  
BE ABLE TO  
RETURN...



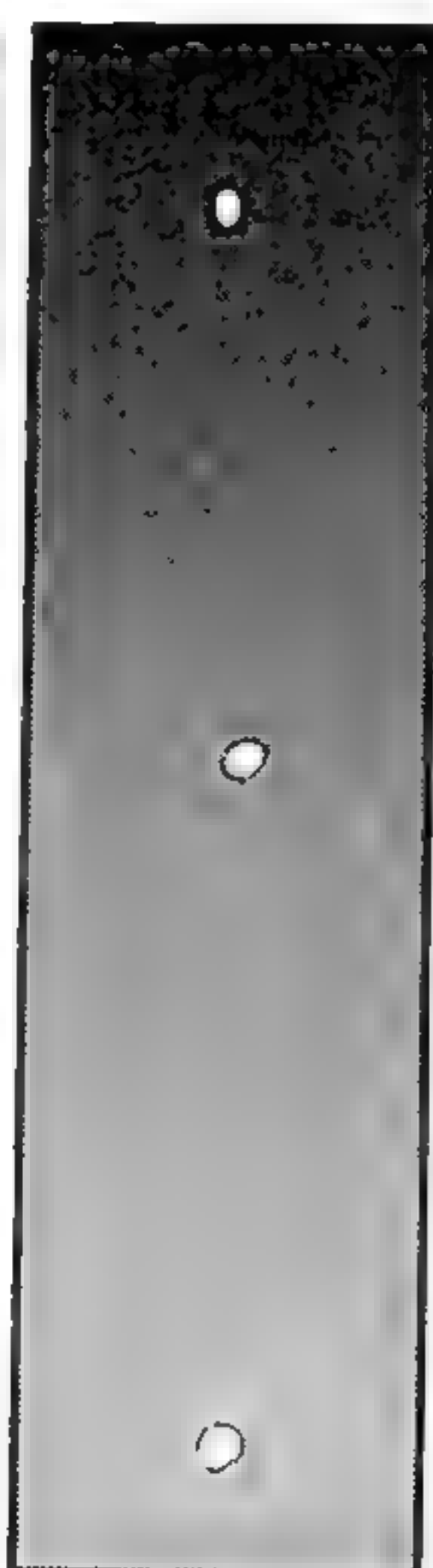
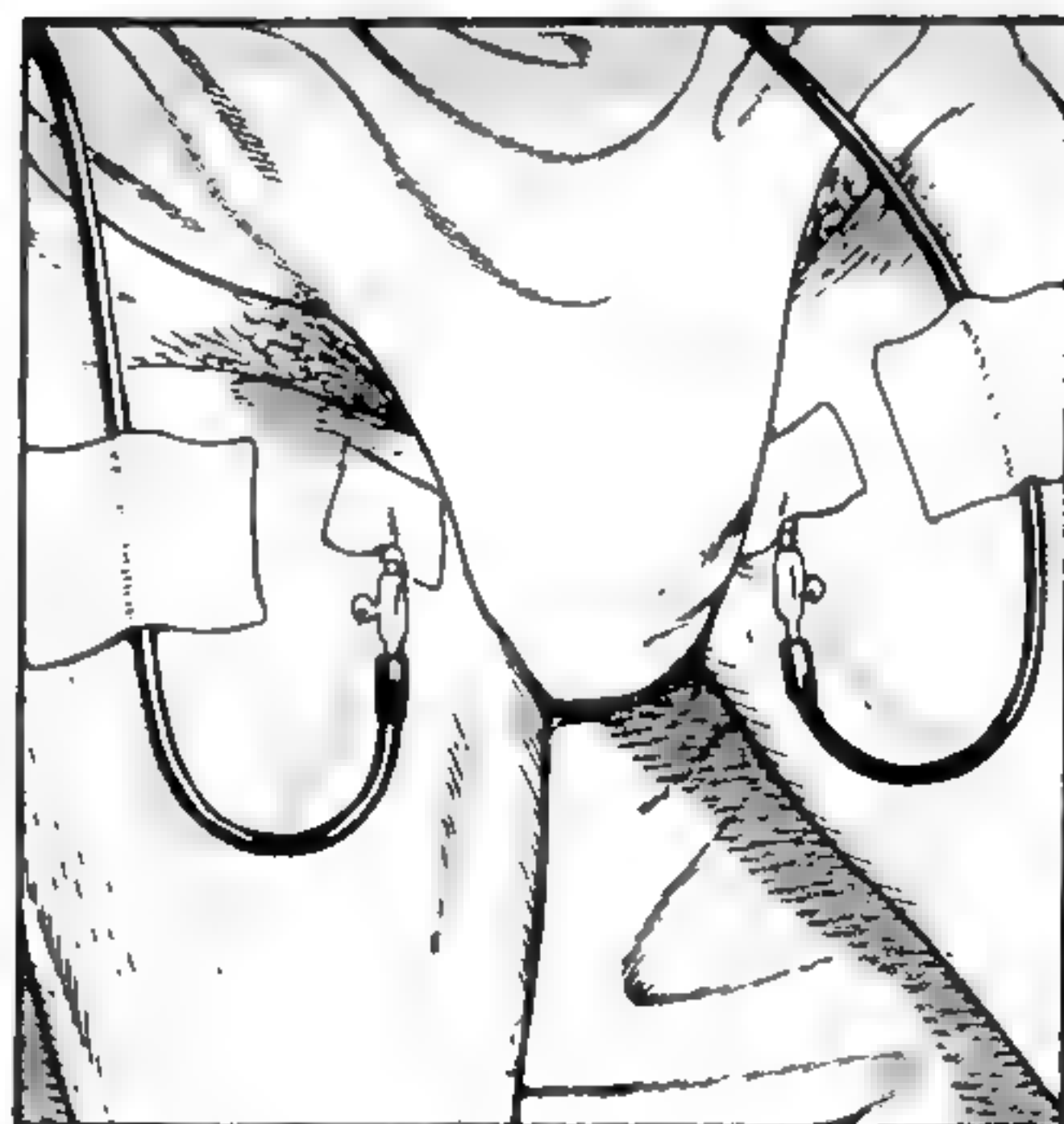
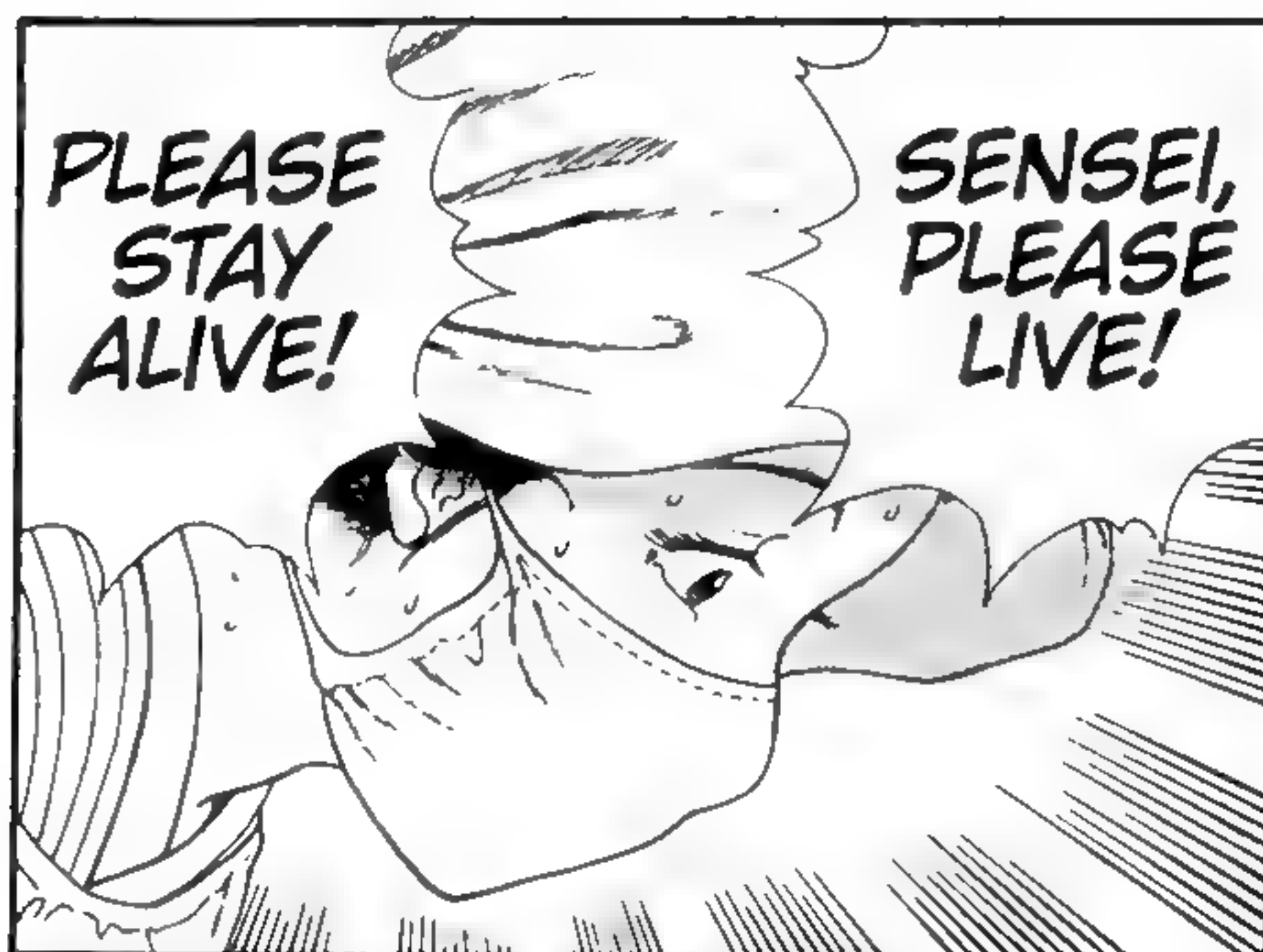
TO THAT  
NIGHT IN JUNE  
IN THE YEAR  
2000...

138 YEARS  
IN THE  
FUTURE...





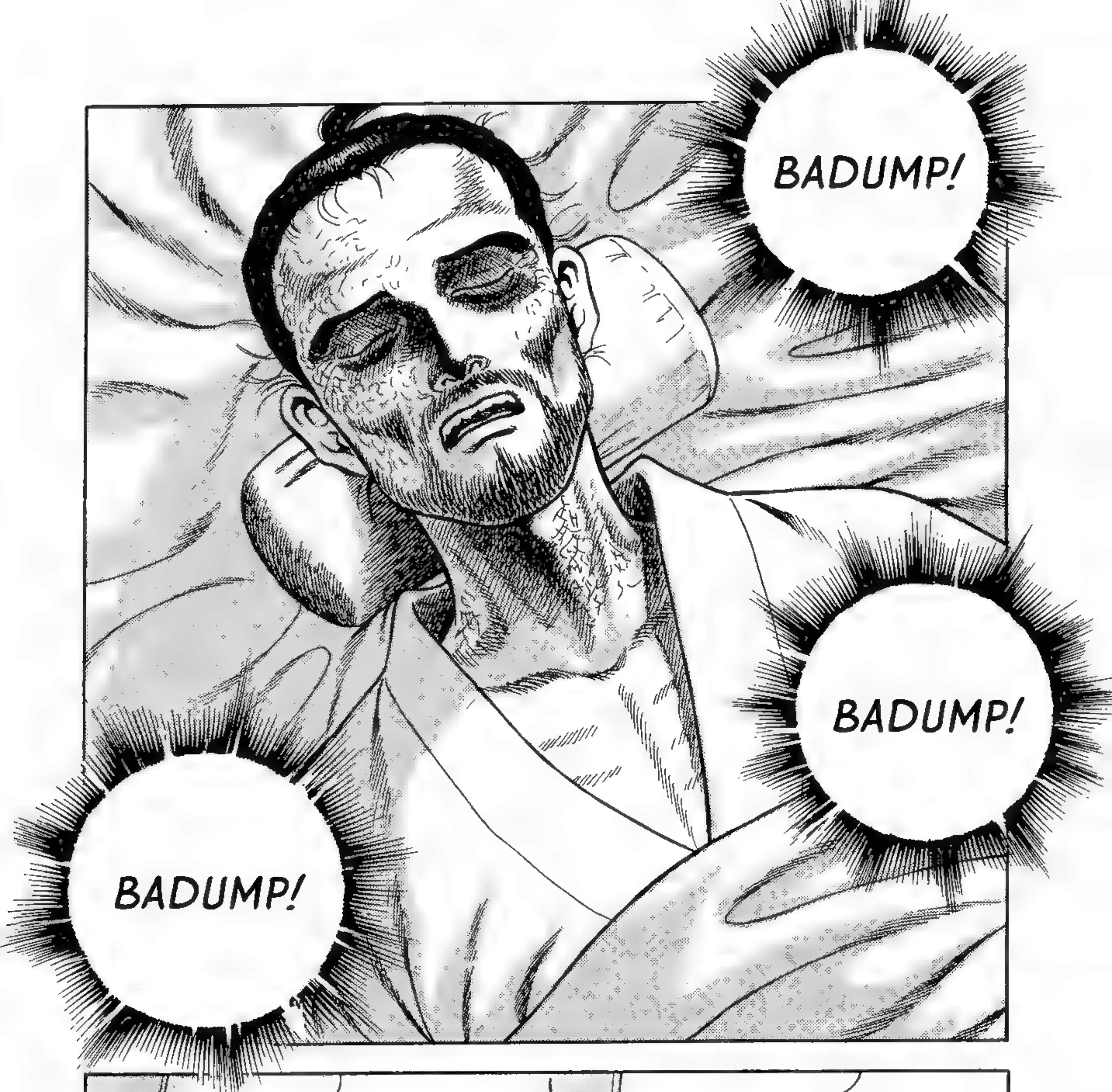




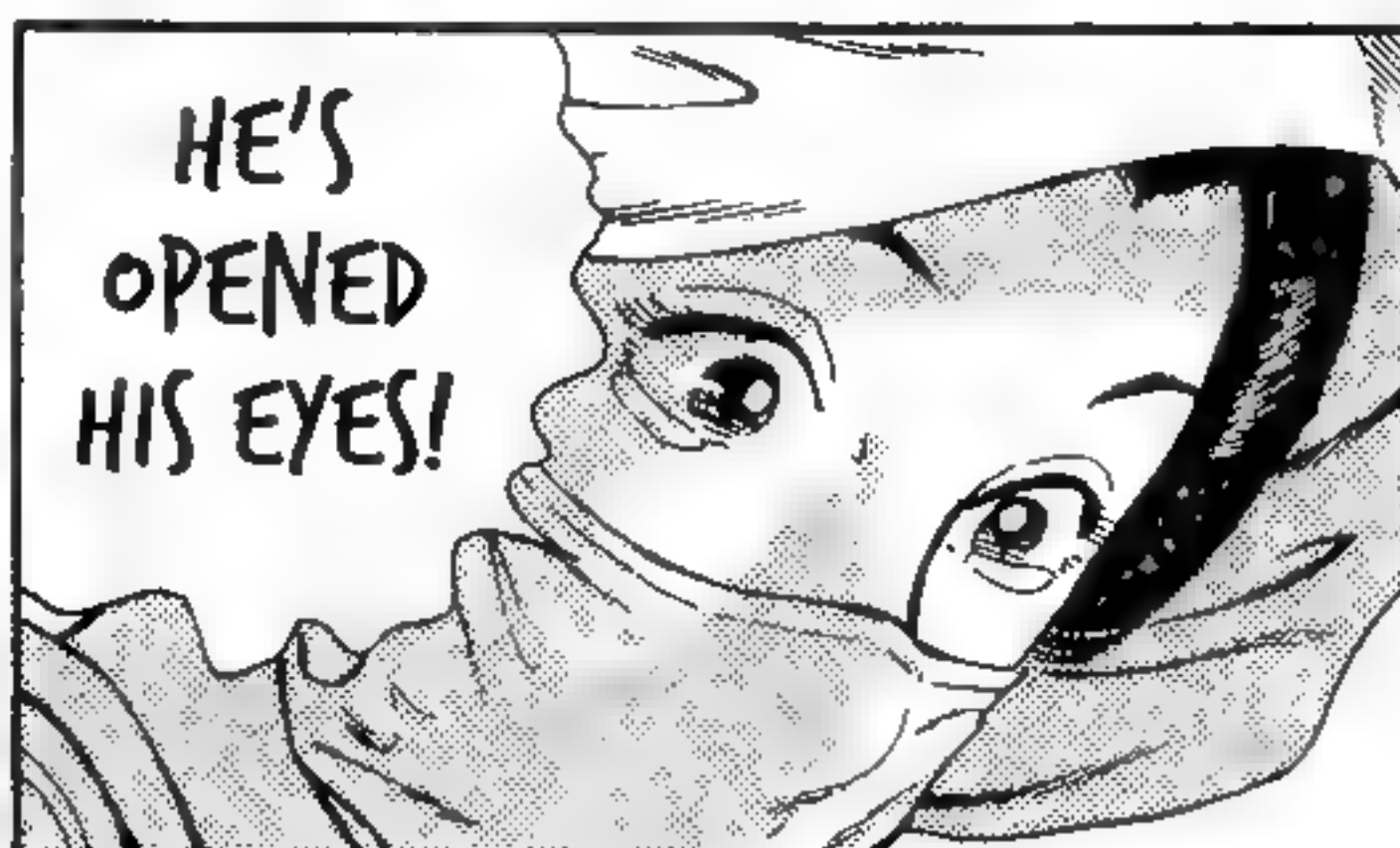














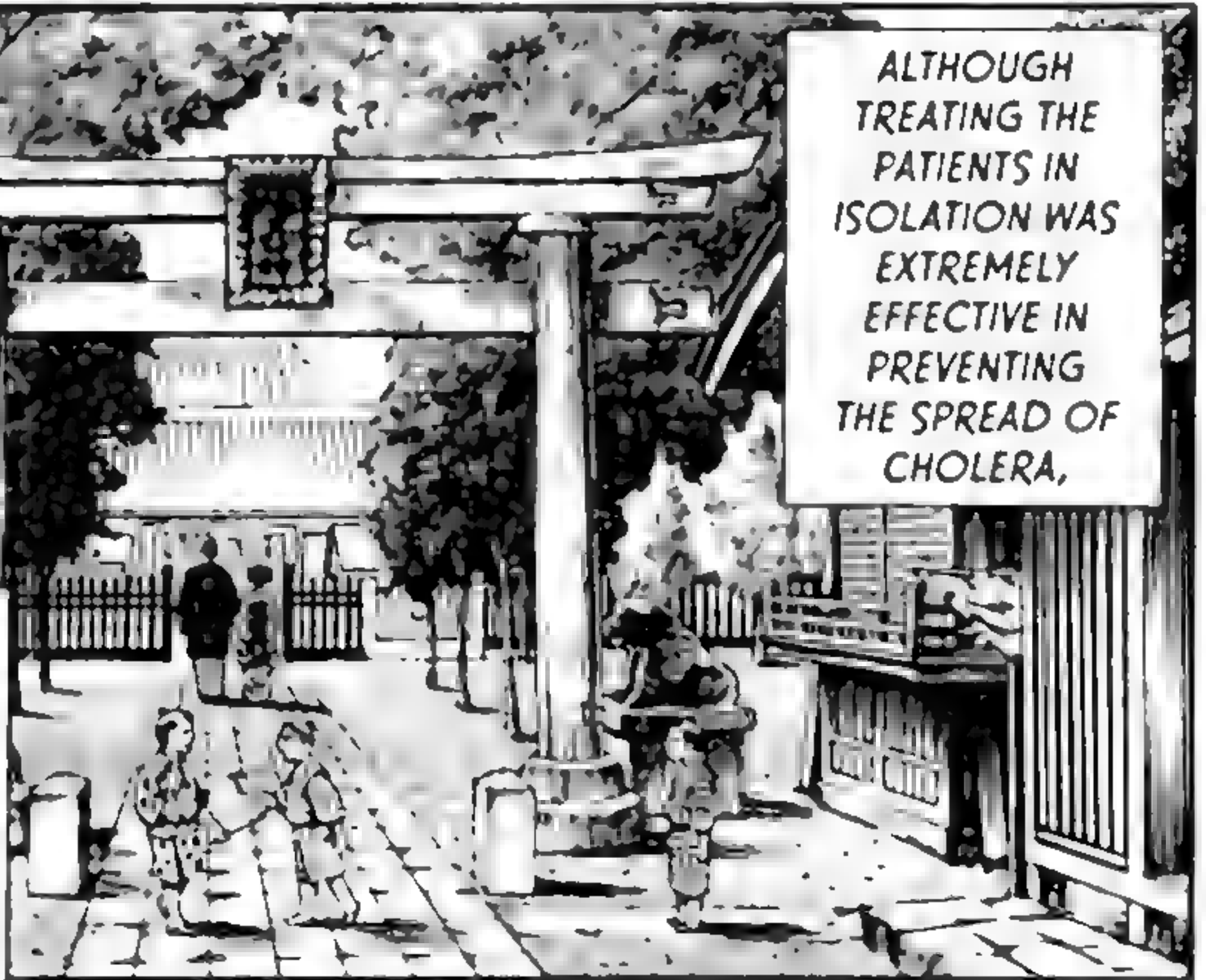
THE CHOLERA  
EPIDEMIC, WHICH  
LOOKED AS IF IT  
WERE ABOUT TO  
SPREAD THROUGH  
EDO LIKE A WILD-  
FIRE, WAS QUICKLY  
PUT OUT.

AND SO  
I WAS  
ABLE TO  
LIVE ON.  
SOON  
AFTER  
THAT...

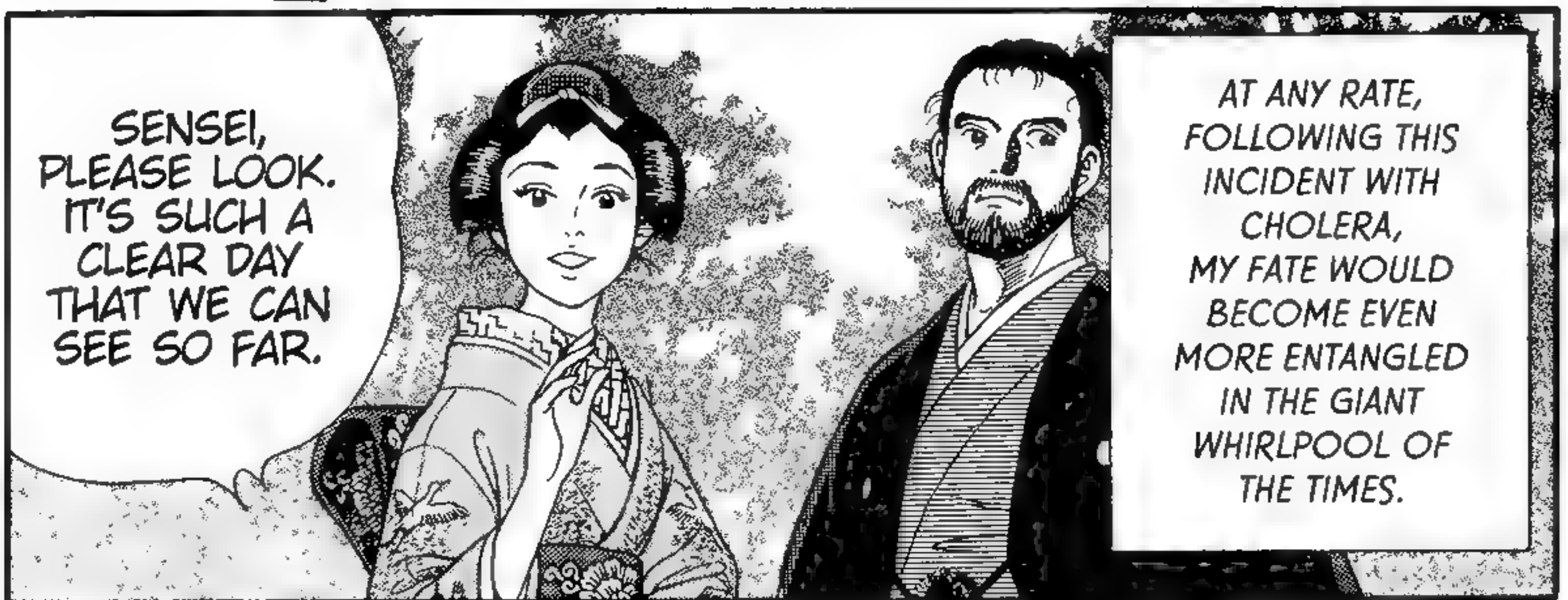


ALTHOUGH  
TREATING THE  
PATIENTS IN  
ISOLATION WAS  
EXTREMELY  
EFFECTIVE IN  
PREVENTING  
THE SPREAD OF  
CHOLERA,

THE IV METHOD OF  
TREATMENT COULD  
NOT BE SUPPLIED IN  
TIME, AND TREATMENT  
THAT RELIED ON ORAL  
HYDRATION ALONE HAD  
ITS LIMITS. MANY OF  
THE LIVES OF THOSE  
WHO WERE IN SERIOUS  
CONDITION FROM THE  
DISEASE COULD NOT  
BE SAVED...









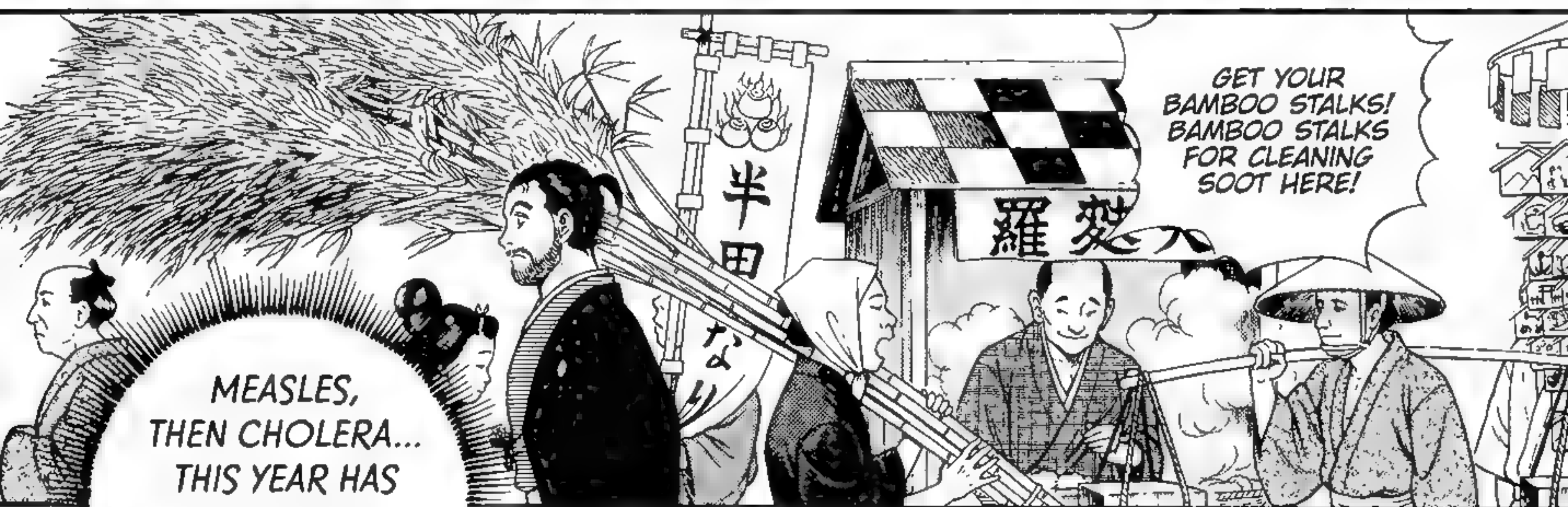
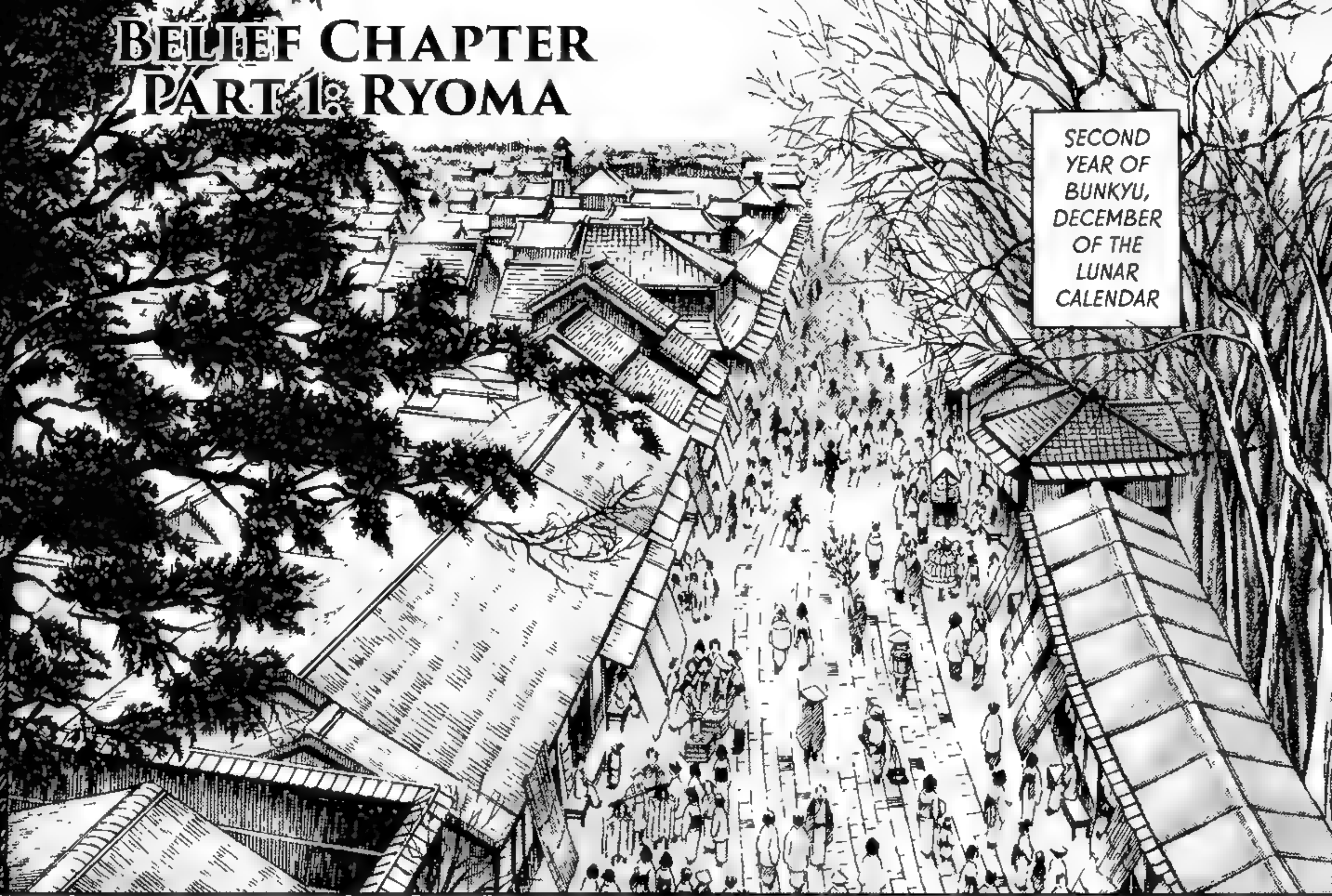
AUTUMN  
HAS COME  
TO EDO...





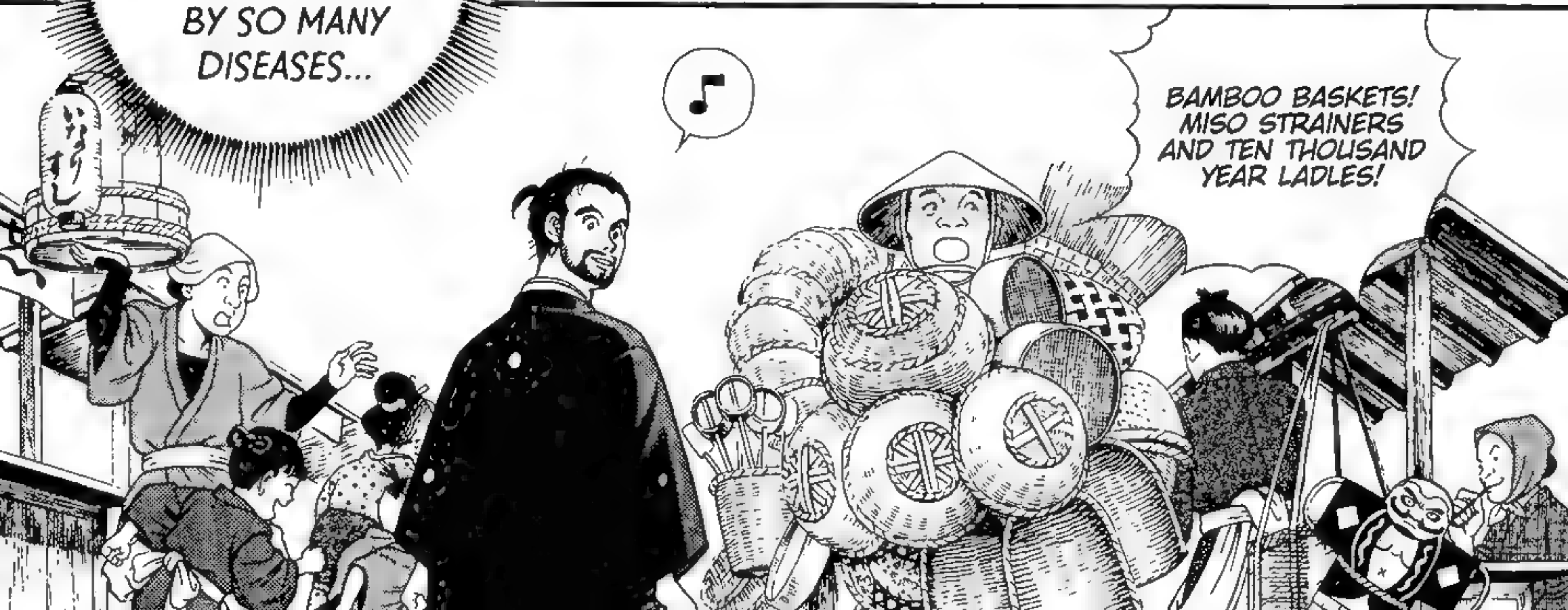
# BELIEF CHAPTER PART 1: RYOMA

SECOND  
YEAR OF  
BUNKYU,  
DECEMBER  
OF THE  
LUNAR  
CALENDAR



GET YOUR  
BAMBOO STALKS!  
BAMBOO STALKS  
FOR CLEANING  
SOOT HERE!

MEASLES,  
THEN CHOLERA...  
THIS YEAR HAS  
BEEN VISITED  
BY SO MANY  
DISEASES...

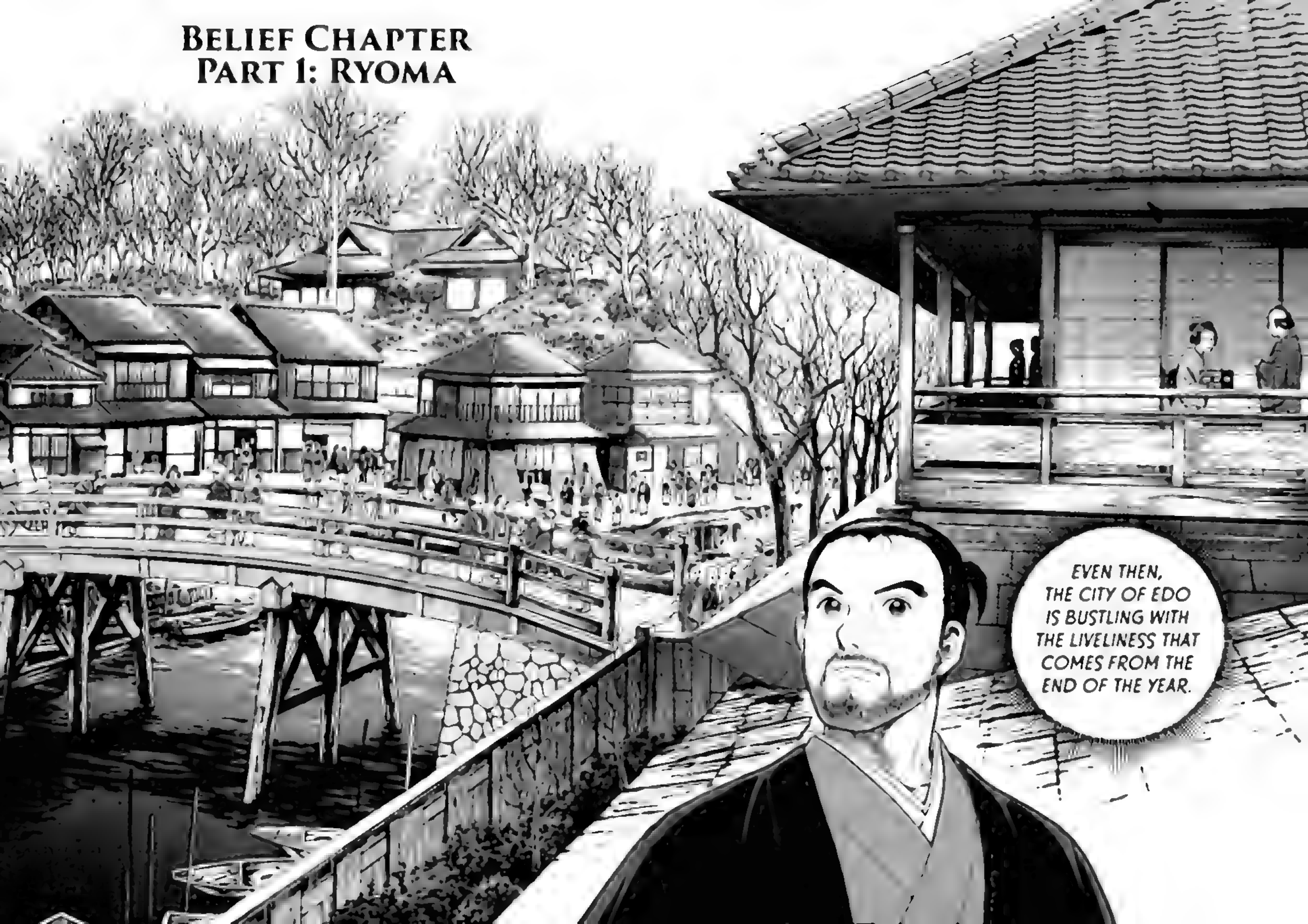


BAMBOO BASKETS!  
MISO STRAINERS  
AND TEN THOUSAND  
YEAR LADLES!



# BELIEF CHAPTER

## PART 1: RYOMA



EVEN THEN,  
THE CITY OF EDO  
IS BUSTLING WITH  
THE LIVELINESS THAT  
COMES FROM THE  
END OF THE YEAR.





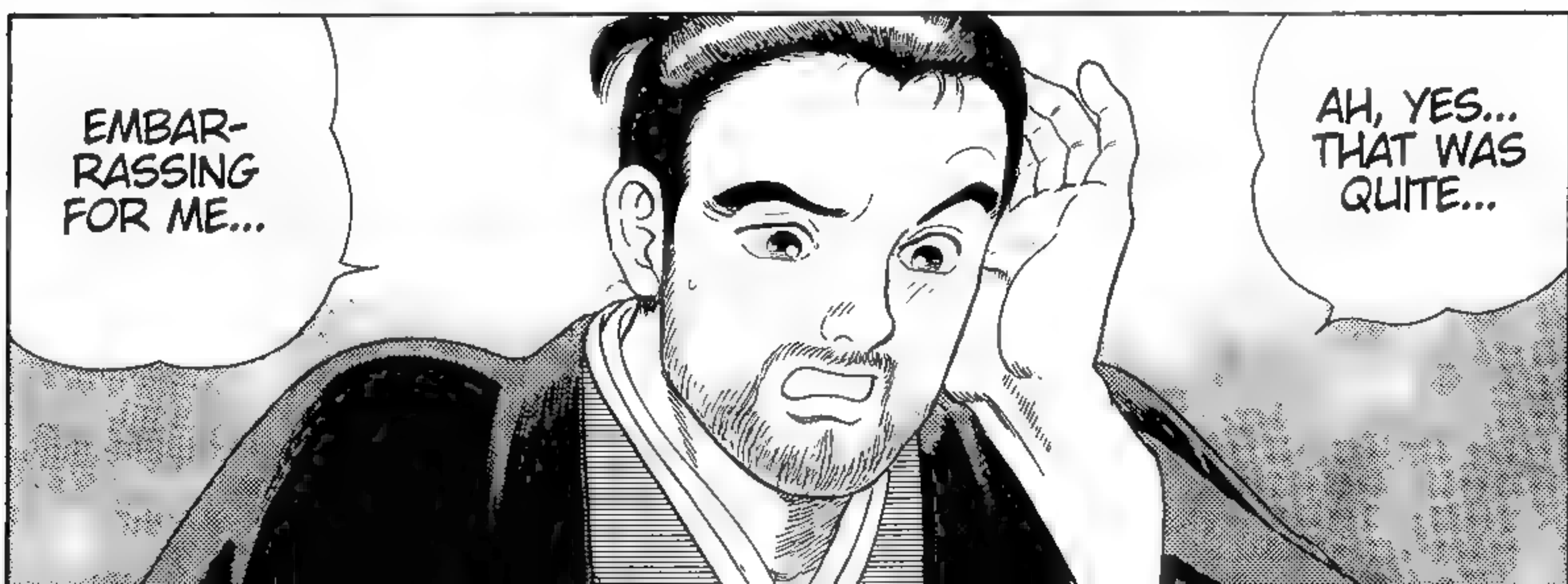
RINTARO  
(KAISHU)  
KATSU'S  
HOUSE IN  
AKASAKA,  
BEHIND  
HIKAWA  
MYOJIN  
SHRINE



ONLY FOR YOU  
TO CATCH IT  
RIGHT AFTER  
AND ALMOST  
DIE FROM IT.

あははは  
Ahaha!

I HEARD THAT  
YOU SAVED PEOPLE  
SUFFERING FROM THE  
CHOLERA EPIDEMIC WITH  
SOME SPECTACULAR  
TREATMENT, SENSEI...



EMBAR-  
RASSING  
FOR ME...

AH, YES...  
THAT WAS  
QUITE...



THAT LEFT A DEEP  
IMPRESSION UPON  
THE DOCTORS THERE.  
IT SHOWED THEM IF  
THEY FOLLOW YOUR  
INSTRUCTIONS, EVEN  
CHOLERA IS NOTHING  
TO BE FEARED.

WHAT MAKES  
THE STORY EVEN  
MORE FUNNY IS  
THAT THE ONE  
WHO SAVED YOU  
WASN'T EVEN A  
DOCTOR. IT WAS  
TACHIBANA-KUN'S  
LITTLE SISTER.







KYOTARO'S  
SISTER MUST  
REALLY BE  
SOMETHING  
ELSE THEN.

YOU'RE  
SO HONEST  
AS USUAL,  
MINAKATA-  
SENSEI...



THE TRUTH IS  
THAT I WAS  
SAVED FROM  
THE BRINK  
OF DEATH BY  
SAKI-DONO  
THANKS TO  
THE LOGICAL  
DECISIONS  
SHE MADE.



WOULD  
THE CORPSE  
RETURN BACK  
TO THE FUTURE,  
OR WOULD IT  
ROT AWAY IN  
THIS TIME?

BY THE WAY,  
WHAT WOULD  
HAPPEN IF  
SOMEONE WHO  
WAS SPIRITED  
AWAY FROM  
THE FUTURE,  
LIKE YOU,  
DIED HERE?



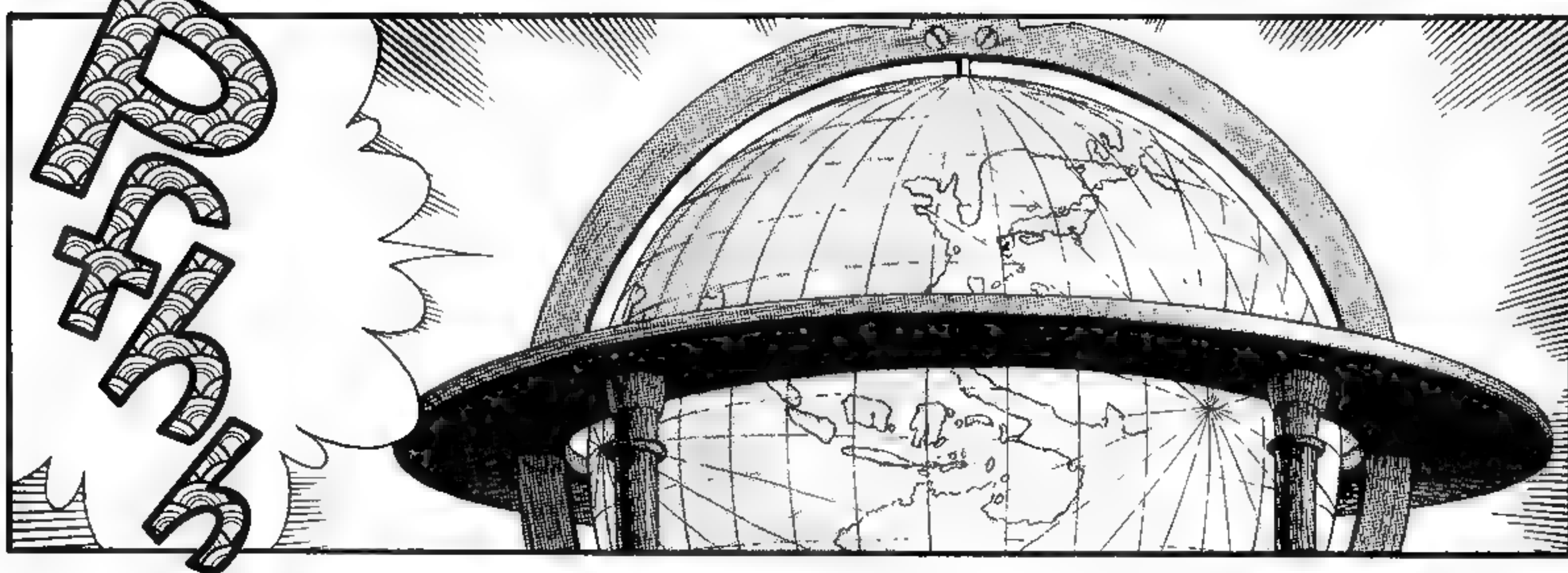
HOWEVER...  
I WASN'T  
READY TO  
DIE YET.

WHEN I WAS  
ON THE VERGE  
OF DEATH FROM  
CHOLERA, I FELT  
LIKE IF I DIED,  
I MIGHT RETURN  
TO THE ERA  
THAT I CAME  
FROM.



...



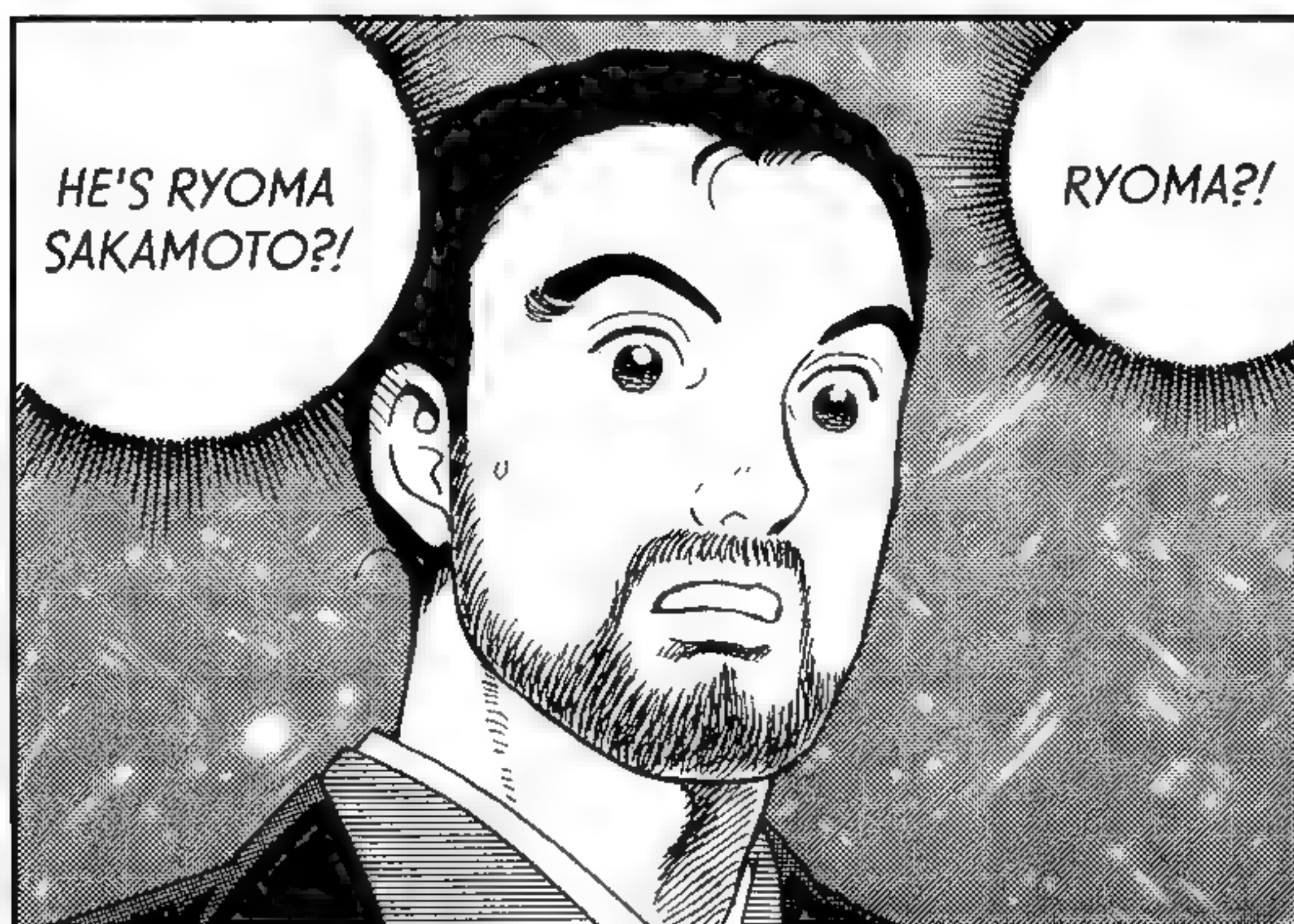




THANKS  
TO THAT,  
MY BELLY'S  
ALL COLD,  
AND I'VE  
GONE TA  
TOOTIN'.

WELL, AIN'T  
THIS VEXIN'.  
YA TOLD  
ME TA WAIT  
OUTSIDE FER  
A LIL', YET  
YA FERGOT  
ABOUT ME?

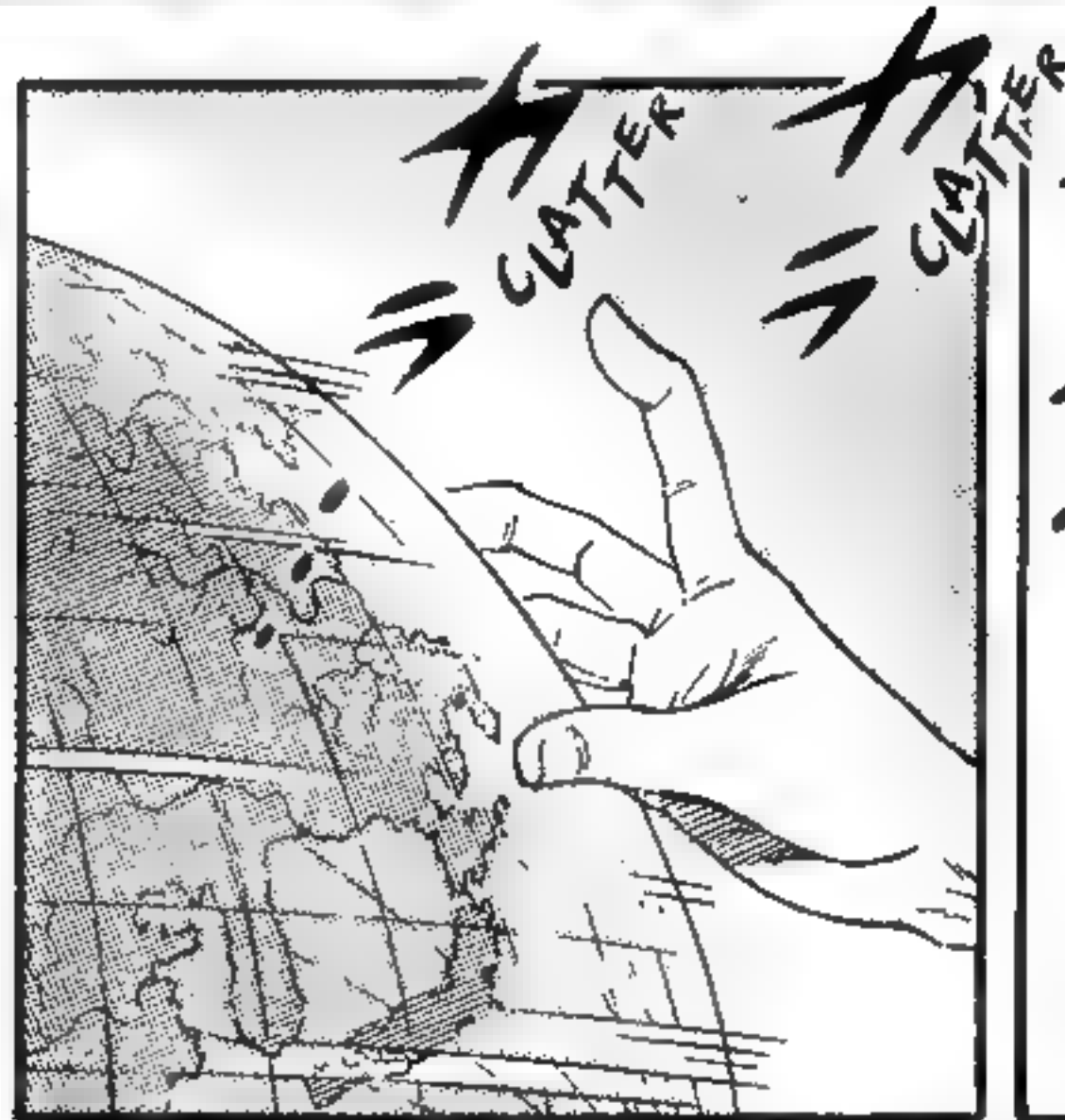








HE'S QUITE INTERESTING, SO I FIGURED I'D INTRODUCE YOU TO HIM...









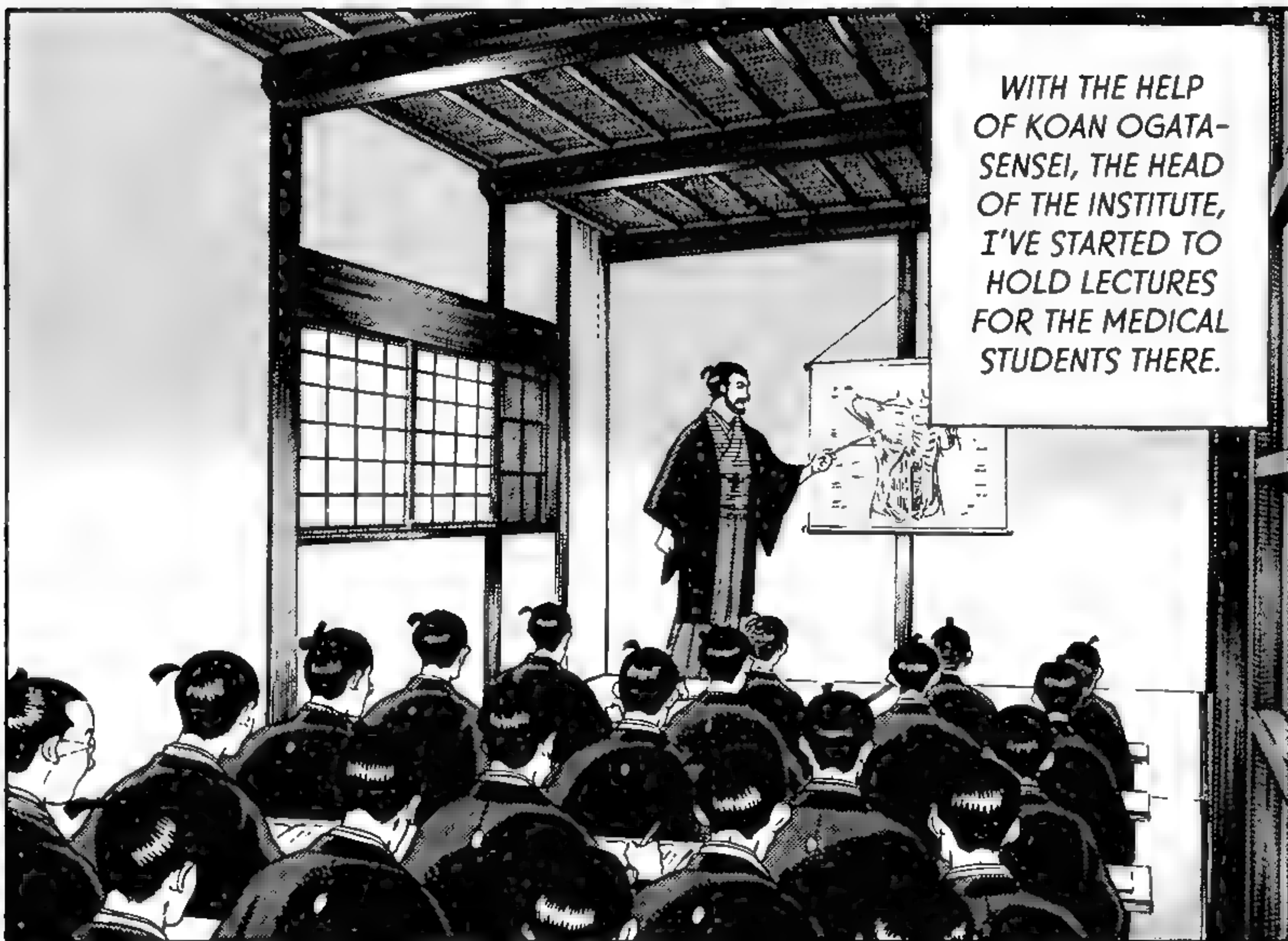




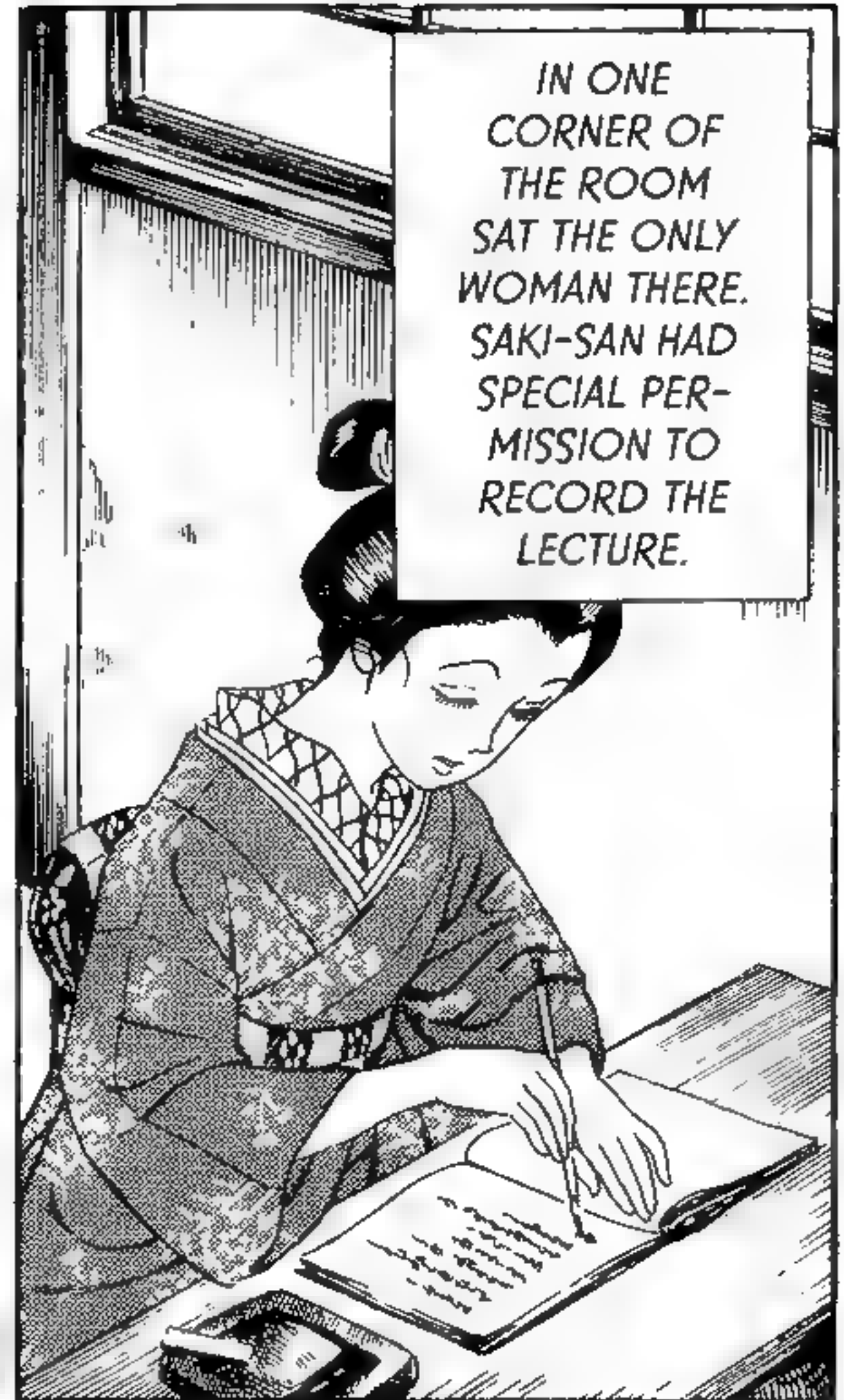
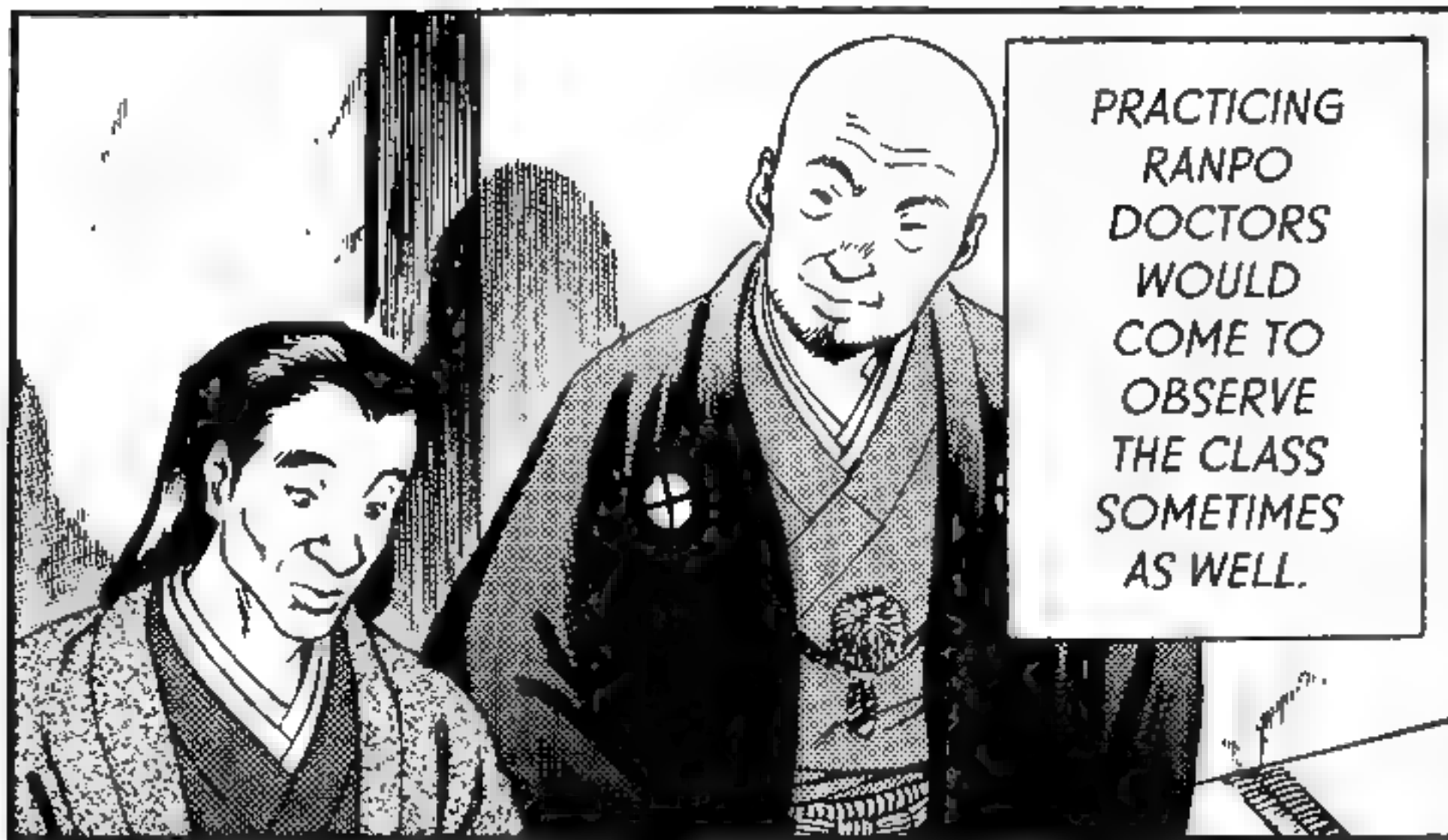
RECENTLY,  
I'VE BEEN  
FREQUENTING  
THE WESTERN  
MEDICAL  
INSTITUTE ON  
AN ALMOST  
DAILY BASIS.



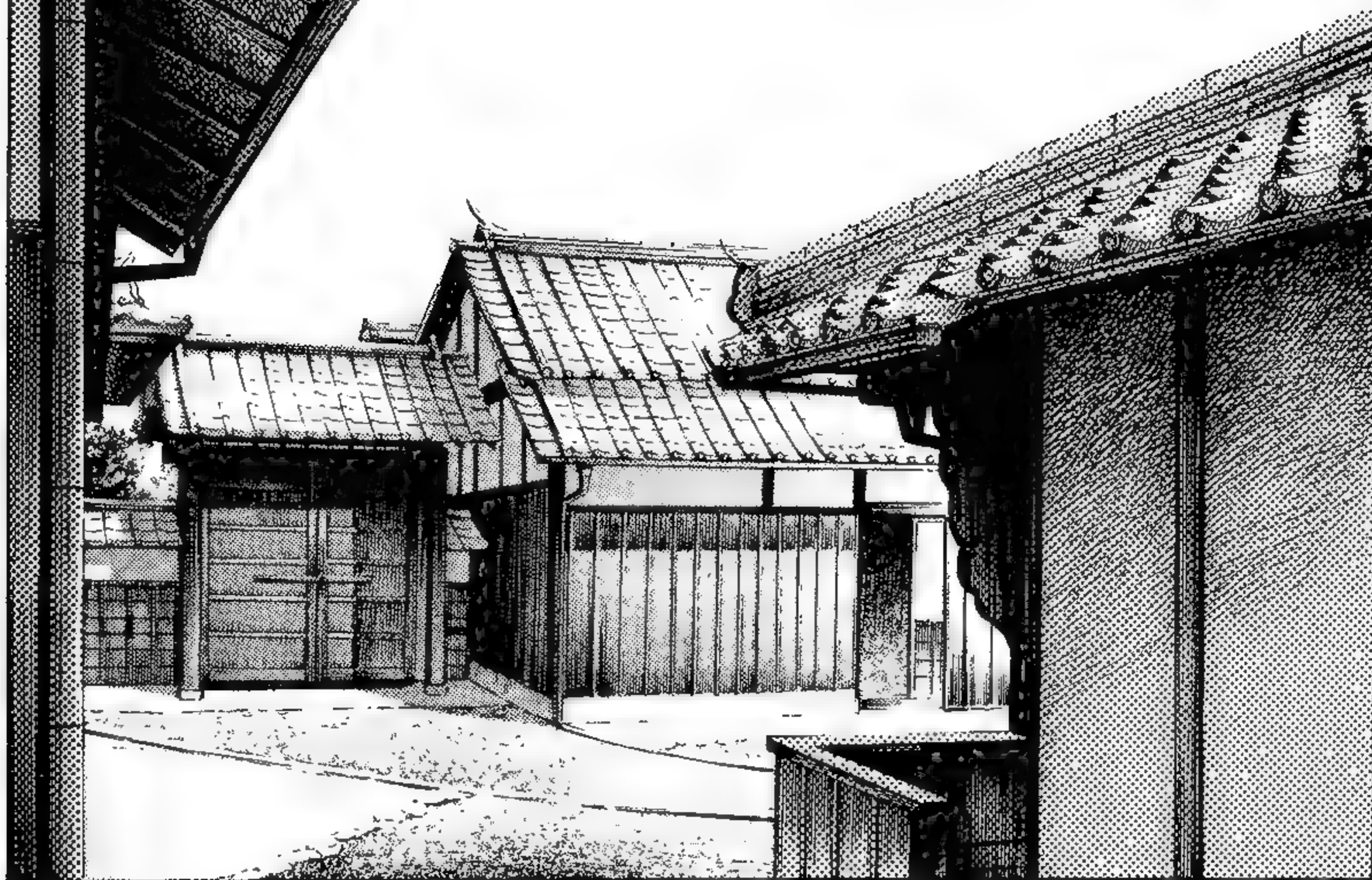
WITH THE HELP  
OF KOAN OGATA-  
SENSEI, THE HEAD  
OF THE INSTITUTE,  
I'VE STARTED TO  
HOLD LECTURES  
FOR THE MEDICAL  
STUDENTS THERE.











THOUGH MY BODY HAS GROWN FRAIL WITH AGE, I WOULD LIKE TO RELEARN THE MEDICAL SCIENCES AGAIN UNDER YOUR TUTELAGE IF THAT IS POSSIBLE.



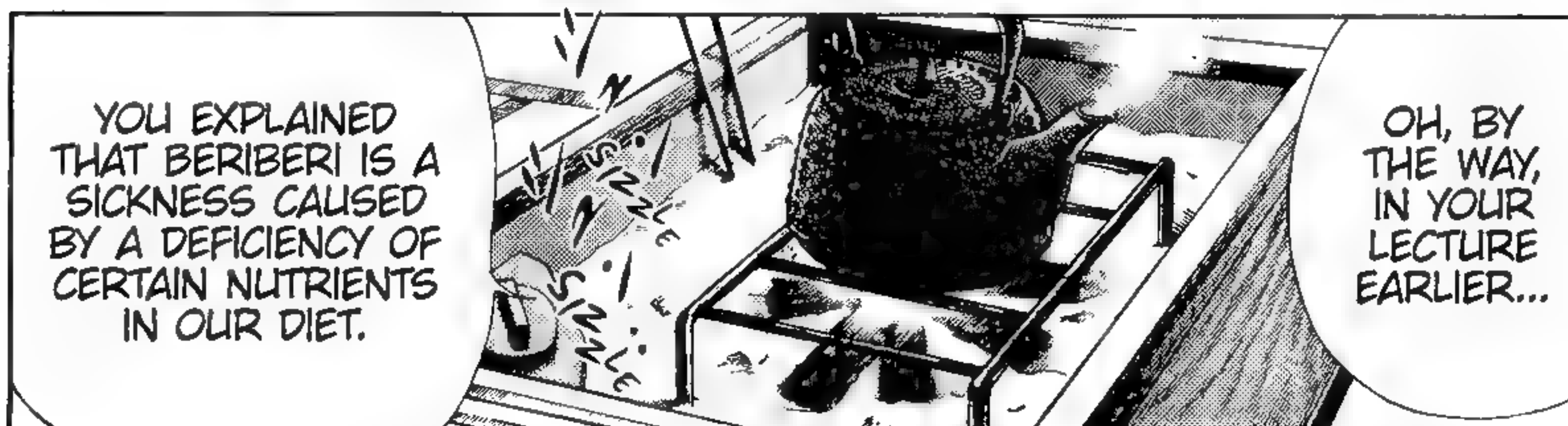
MINAKATA-DONO... DESPITE ALL THE YEARS I'VE SPENT STUDYING MEDICINE, I FEEL LIKE MY EYES ARE BEING OPENED TO AN ENTIRELY DIFFERENT WORLD.



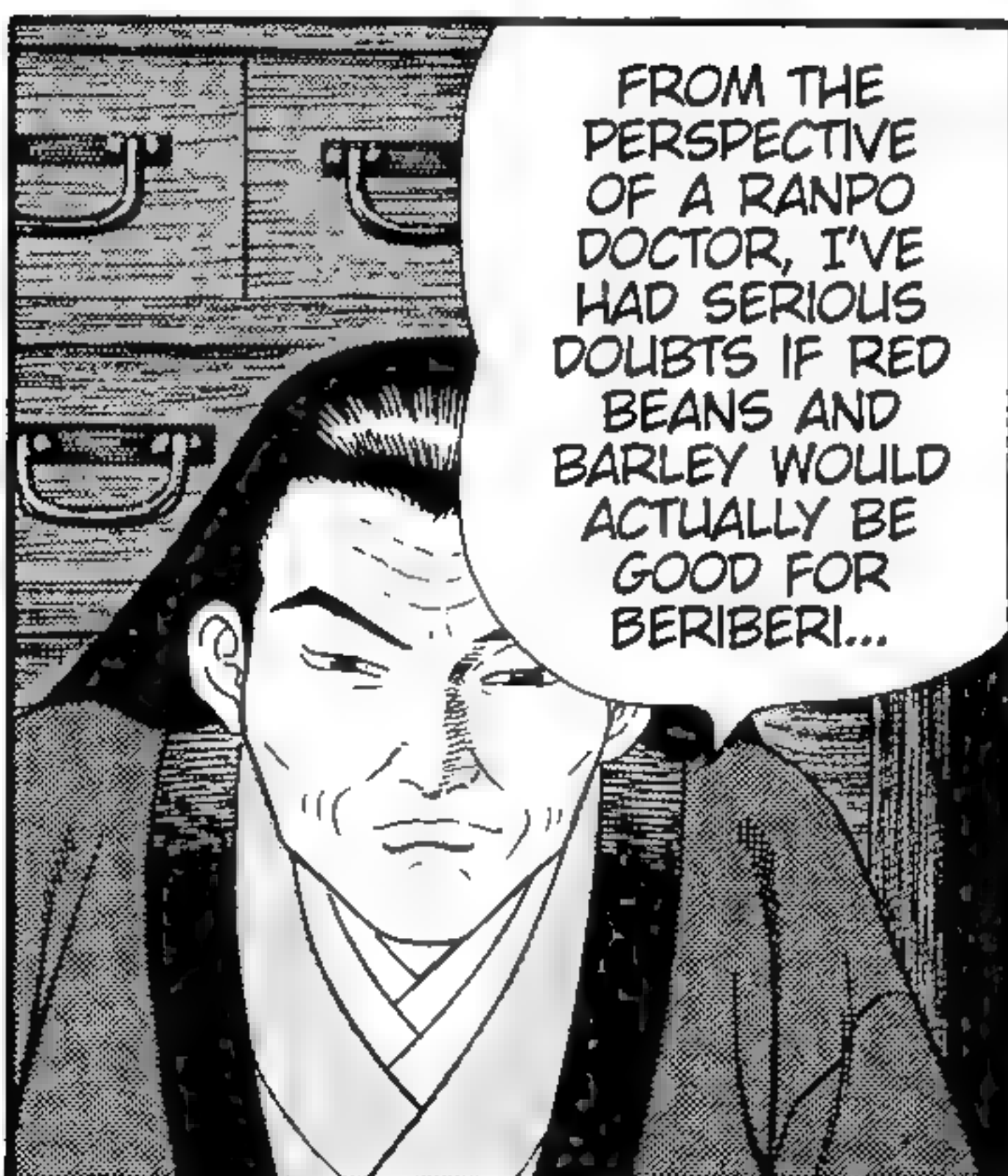
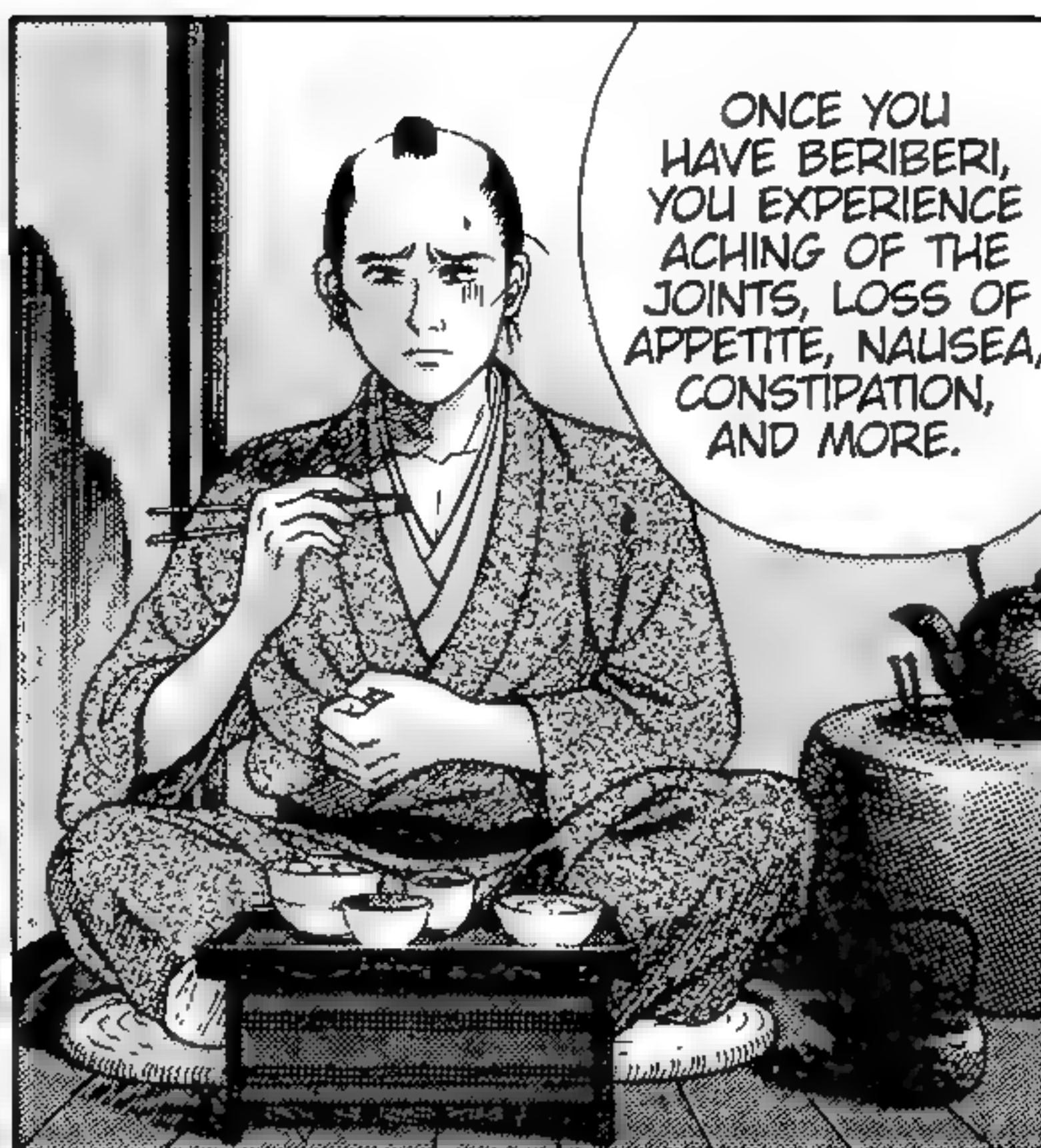
YOU ARE A DOCTOR THAT HAS REACHED THE PINNACLE OF MEDICAL KNOWLEDGE THAT EXISTS IN THIS ERA.

PLEASE, YOU DON'T NEED TO. BUT I'M PROFOUNDLY HONORED TO HEAR THAT.

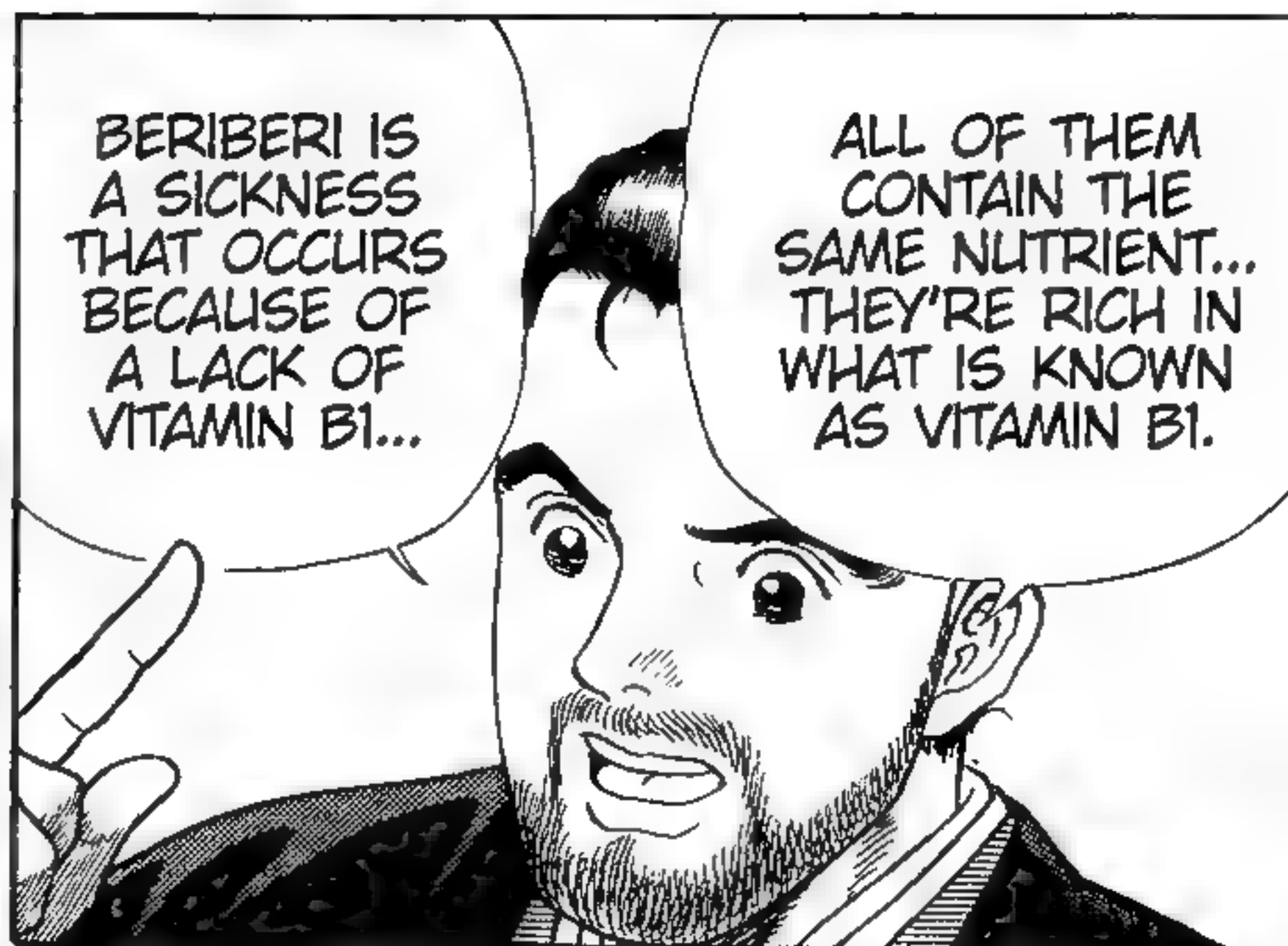











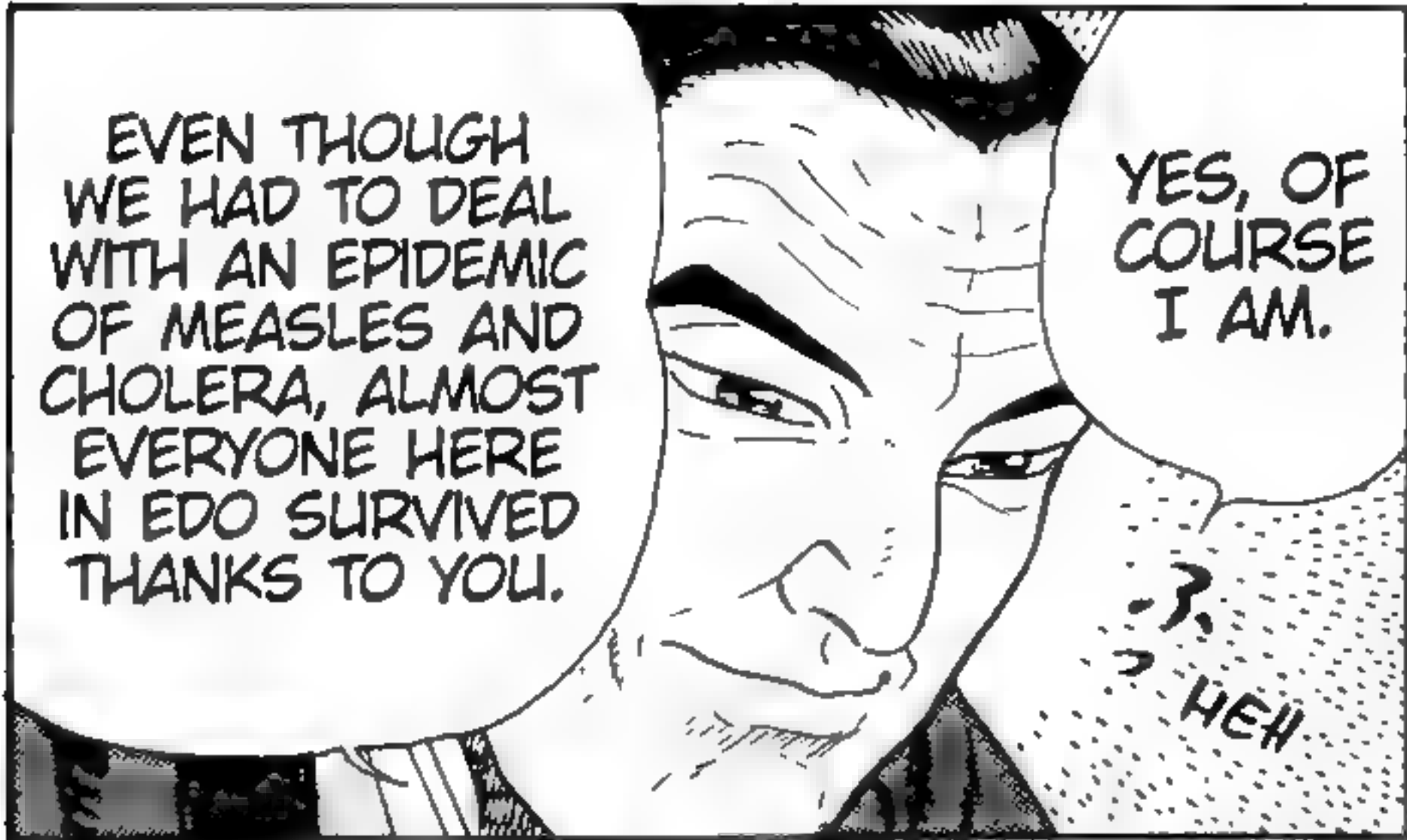






I'LL MAKE SURE TO  
INFORM THE HIGHER-  
UPS ABOUT THIS SO  
THE WESTERN MEDICAL  
INSTITUTION CAN LEAD  
THE WAY IN SPREADING  
THIS METHOD THAT'S  
BASED ON DIET.


I UNDERSTAND...  
RED BEANS ARE  
VERY EXPENSIVE,  
BUT ANYONE CAN  
GET THEIR HANDS  
ON BROWN RICE  
AND SWEET  
POTATOES.



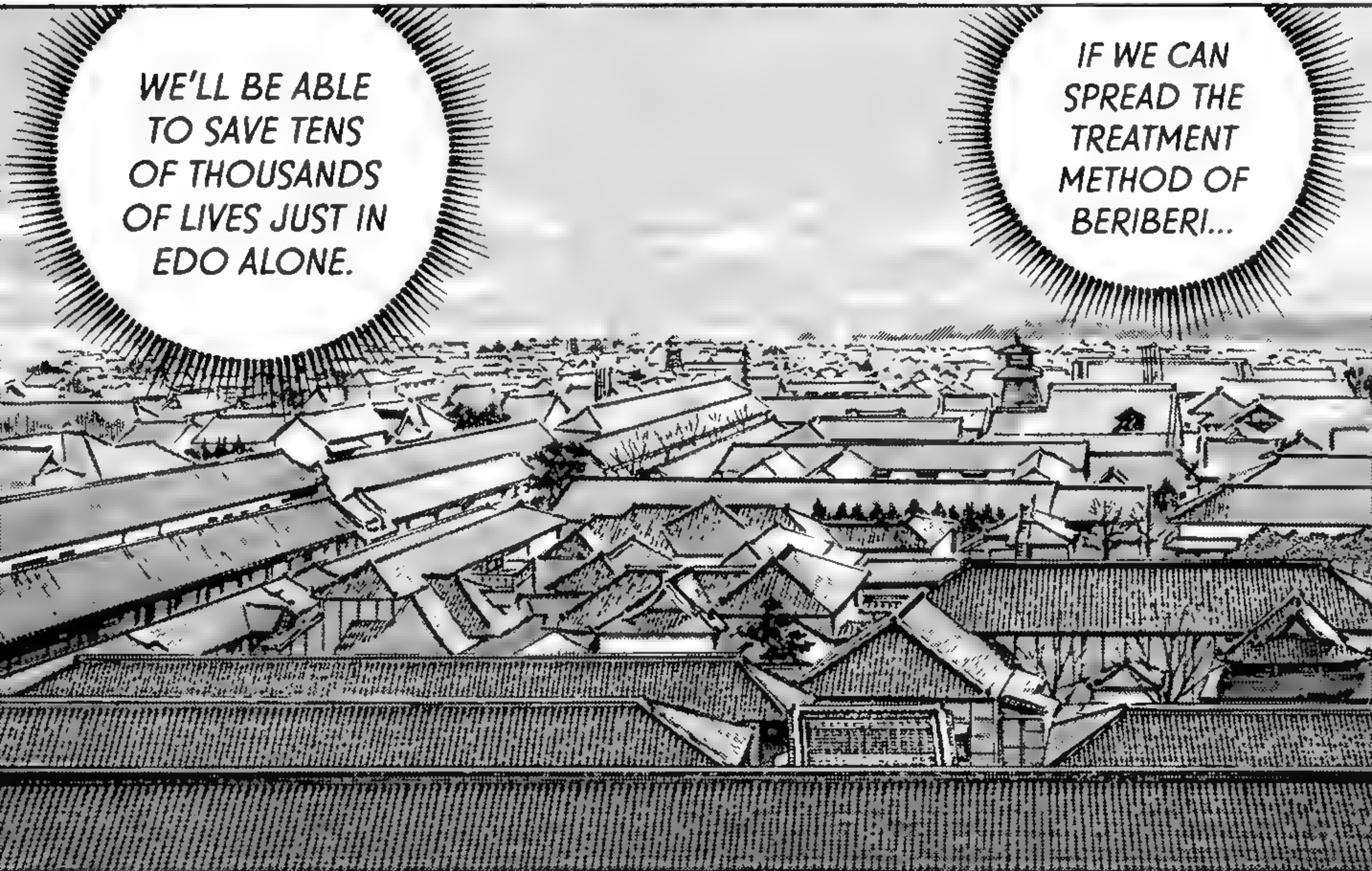
EVEN THOUGH  
WE HAD TO DEAL  
WITH AN EPIDEMIC  
OF MEASLES AND  
CHOLERA, ALMOST  
EVERYONE HERE  
IN EDO SURVIVED  
THANKS TO YOU.

YES, OF  
COURSE  
I AM.

HEH



OGATA-SENSEI,  
YOU'RE GOING  
TO ADOPT MY  
SUGGESTIONS?!



WE'LL BE ABLE  
TO SAVE TENS  
OF THOUSANDS  
OF LIVES JUST IN  
EDO ALONE.

IF WE CAN  
SPREAD THE  
TREATMENT  
METHOD OF  
BERIBERI...

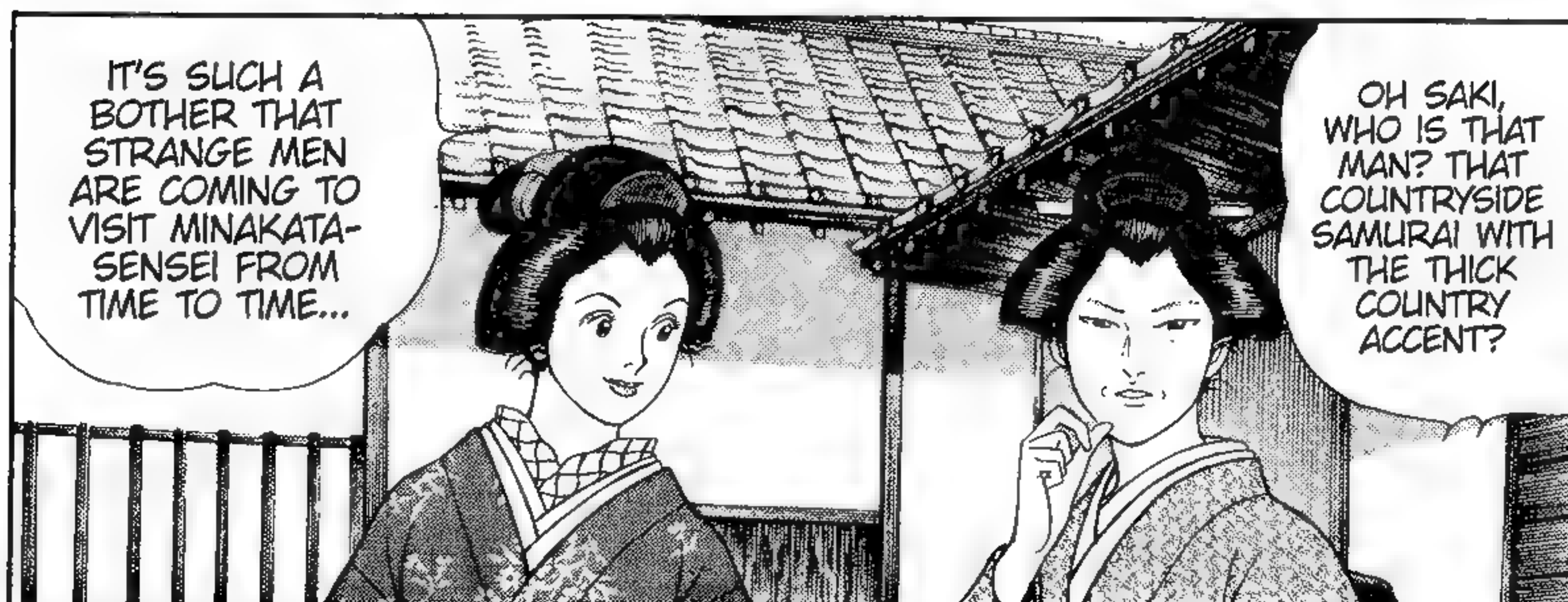
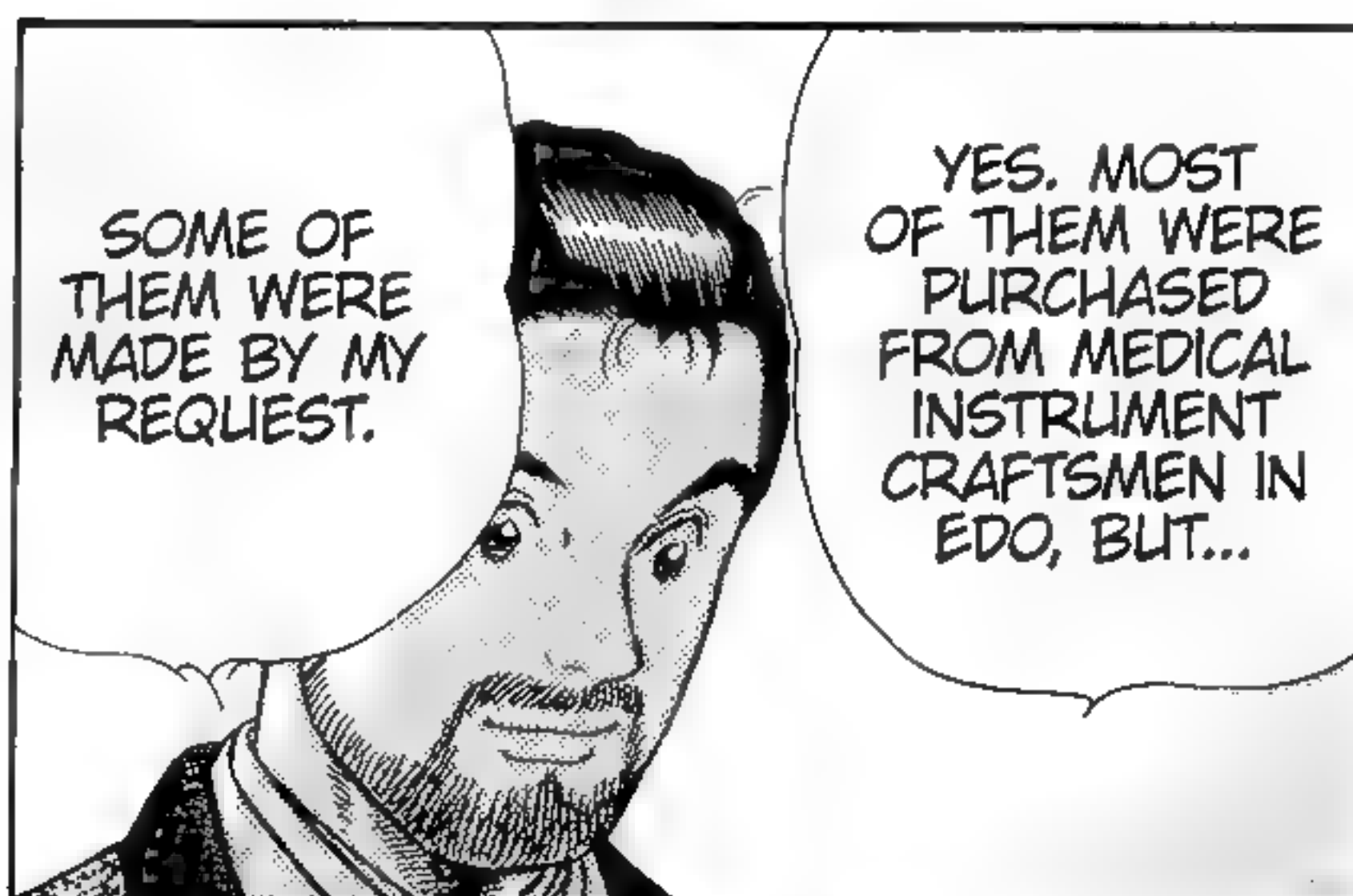




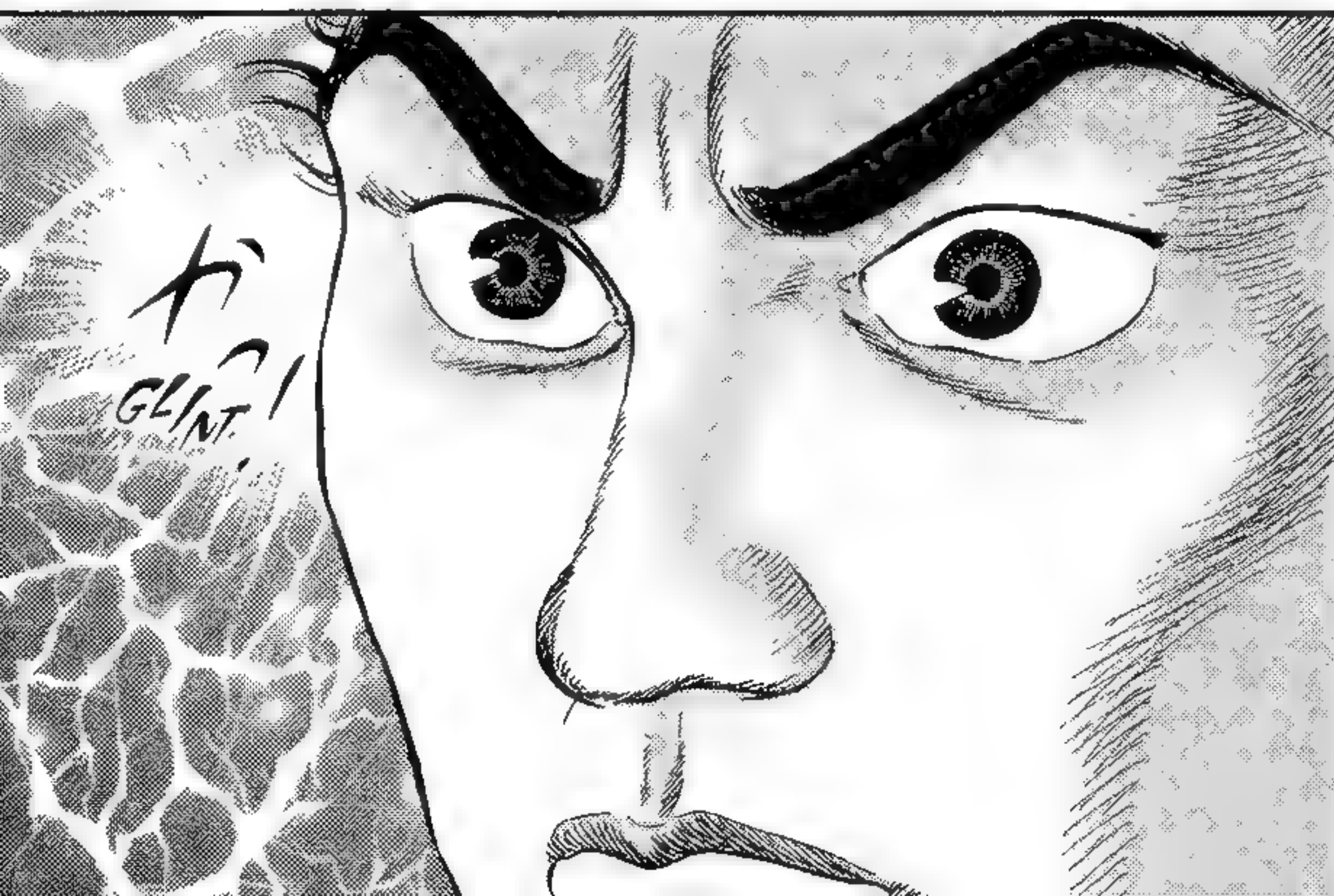
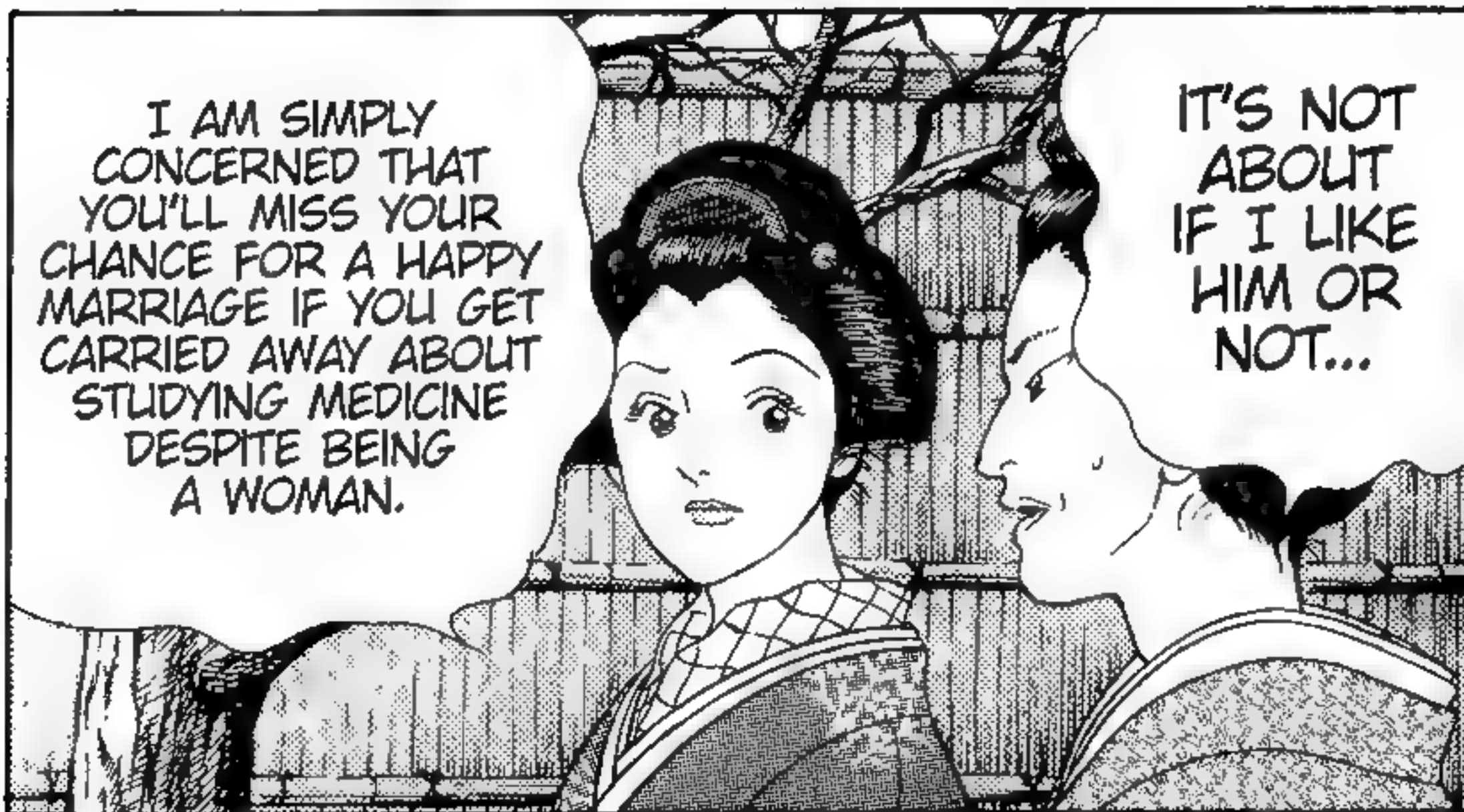




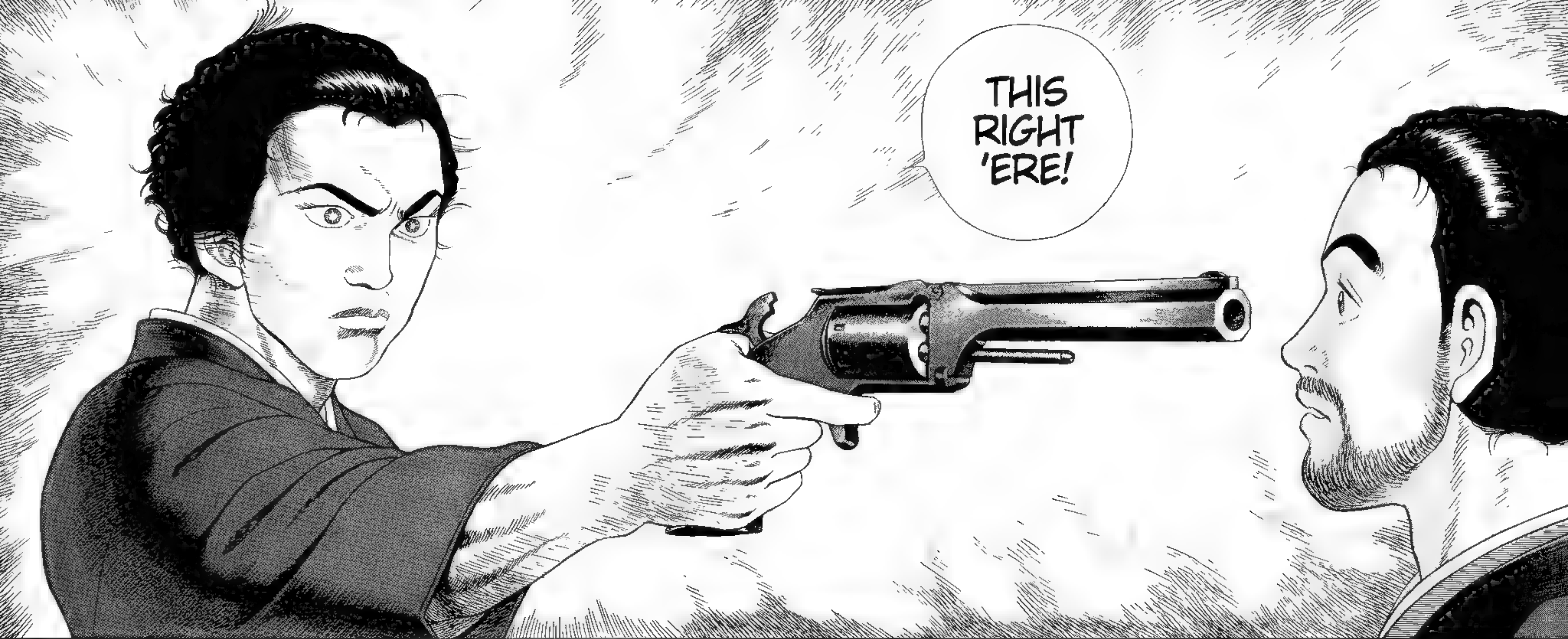












THIS  
RIGHT  
'ERE!



IF YOU  
GIVE ME AN  
ANSWER THAT  
I DON'T LIKE...  
I'LL SHOOT!

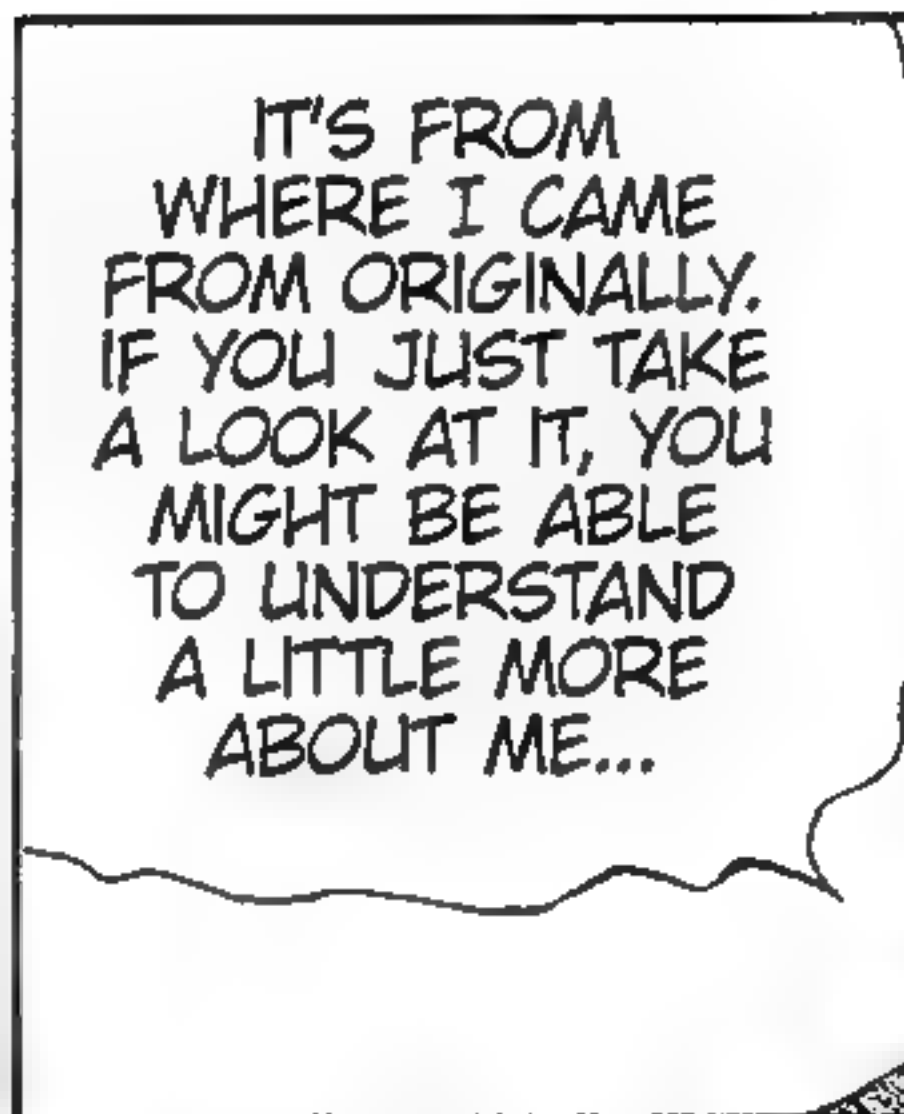
WHERE'D YA  
COME FROM?!  
WHY ARE YA  
TRYIN' TO COZY  
UP TO KATSU-  
SAMA?!

ANSWER  
ME!! WHO  
ARE YA?!

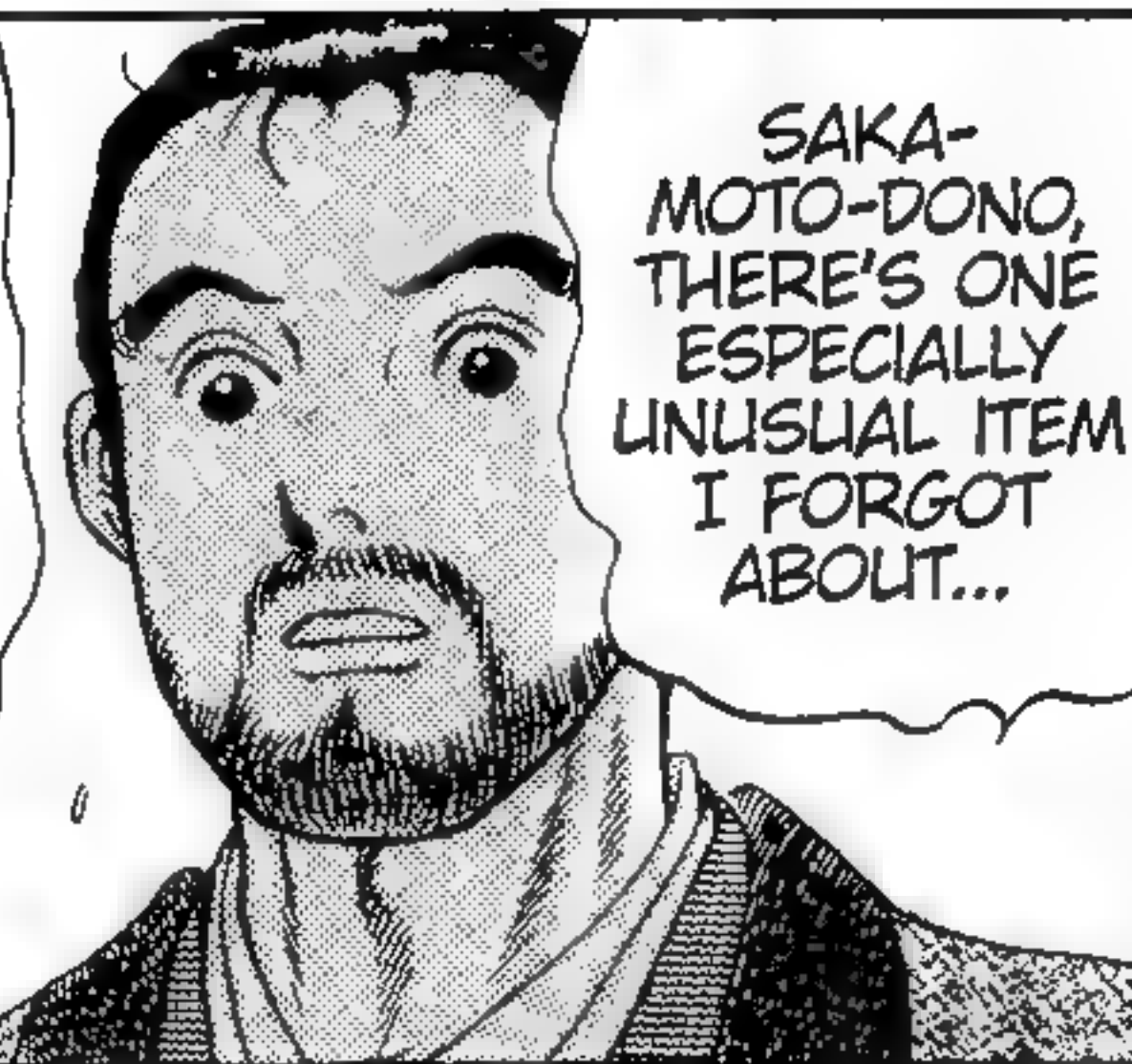




THEN  
SHOW  
IT TO  
ME.



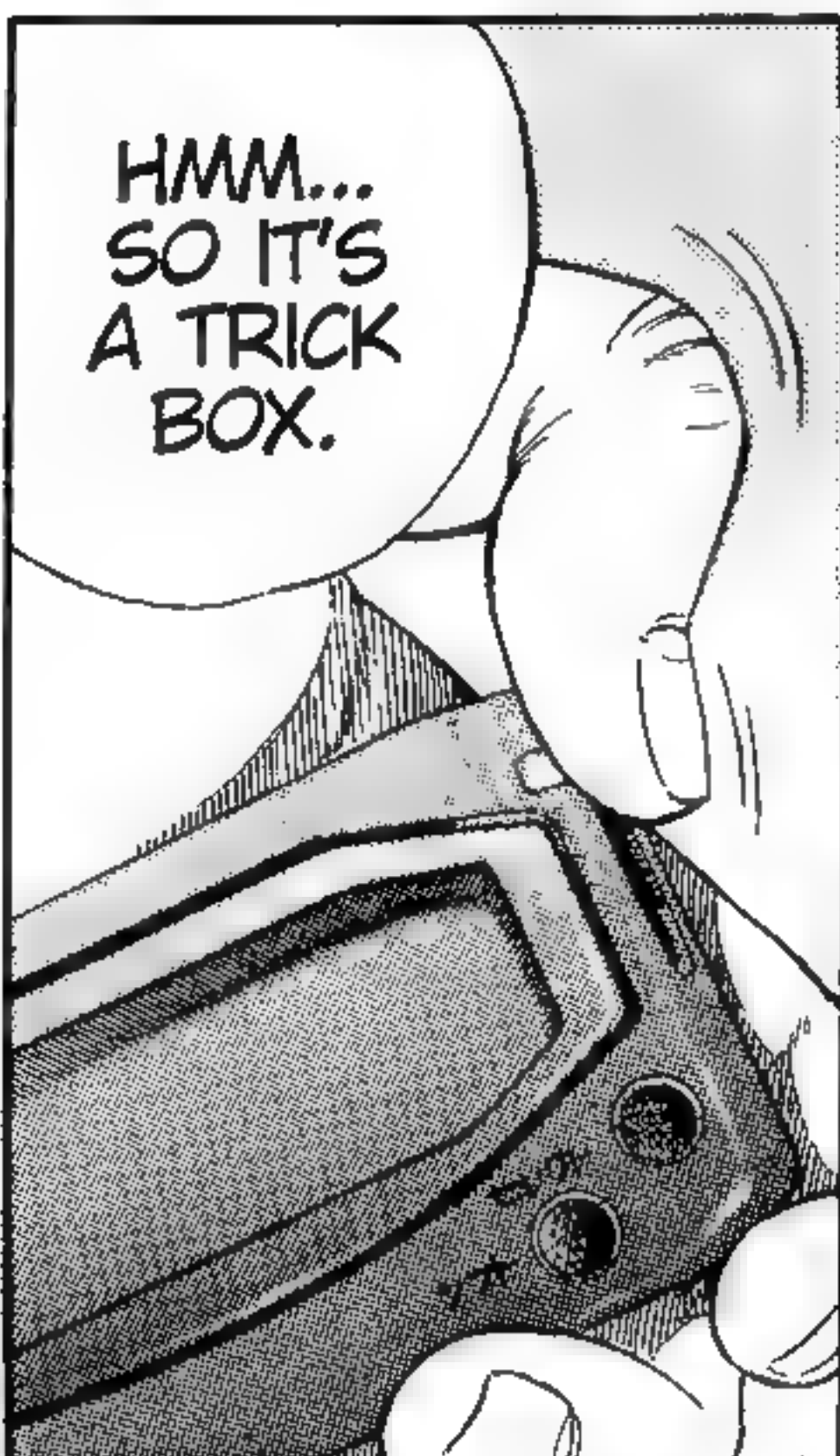
IT'S FROM  
WHERE I CAME  
FROM ORIGINALLY.  
IF YOU JUST TAKE  
A LOOK AT IT, YOU  
MIGHT BE ABLE  
TO UNDERSTAND  
A LITTLE MORE  
ABOUT ME...



SAKA-  
MOTO-DONO,  
THERE'S ONE  
ESPECIALLY  
UNUSUAL ITEM  
I FORGOT  
ABOUT...



WHAT...  
IS THAT?



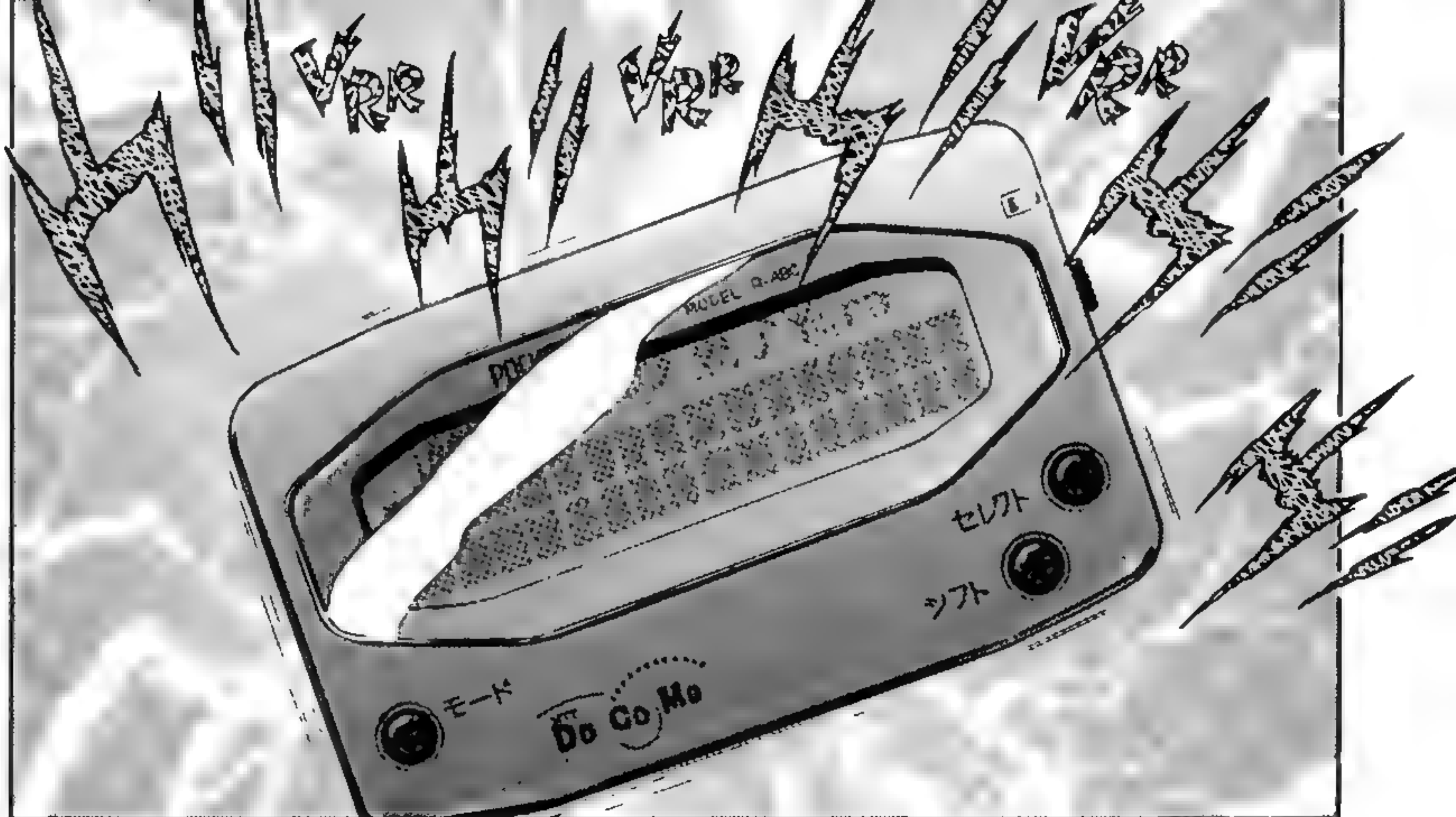
HMM...  
SO IT'S  
A TRICK  
BOX.



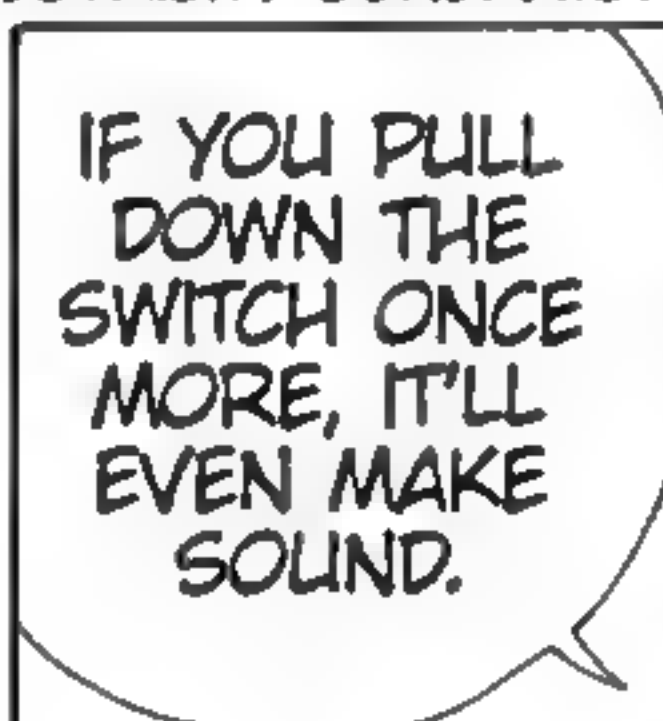
THIS SMALL  
BOX CAN MAKE  
NOISE. PLEASE  
TRY PULLING  
DOWN ON THE  
SWITCH ON THE  
RIGHT SIDE.

THIS IS  
CALLED A  
PAGER.





\*AN OLD JAPANESE WORD FOR A STATIC ELECTRICITY GENERATOR, ALSO USED TO SIMPLY REFER TO "ELECTRICITY."



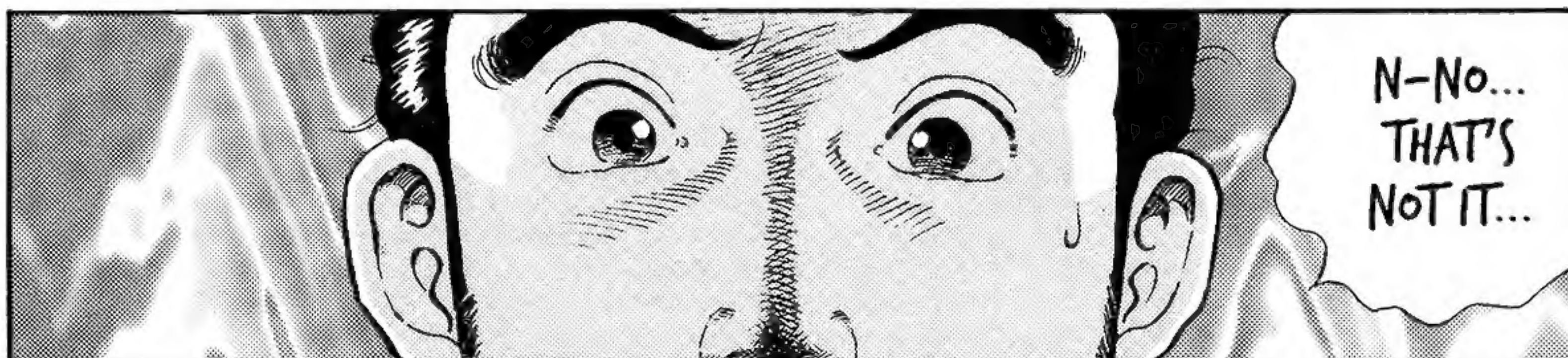








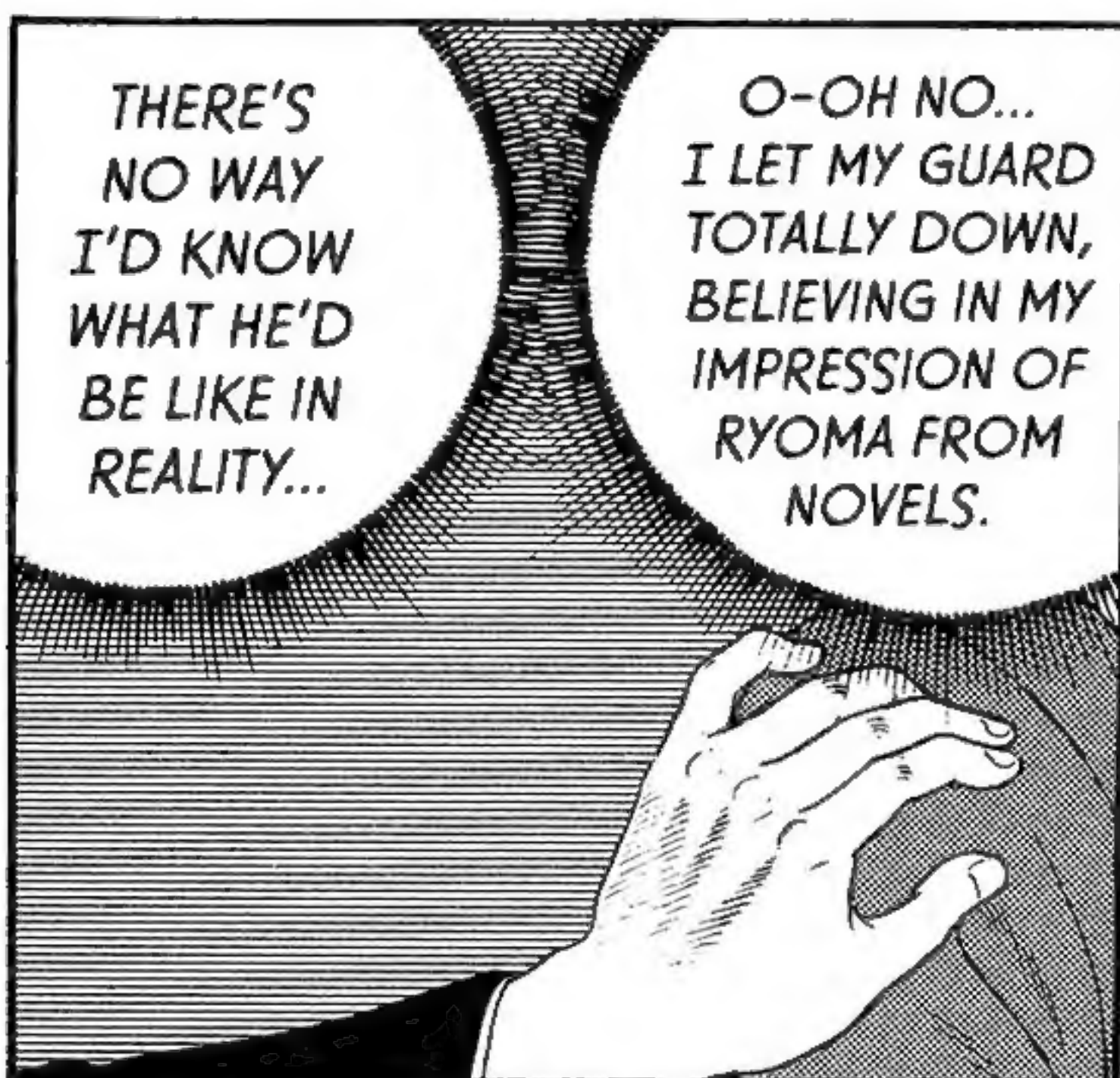




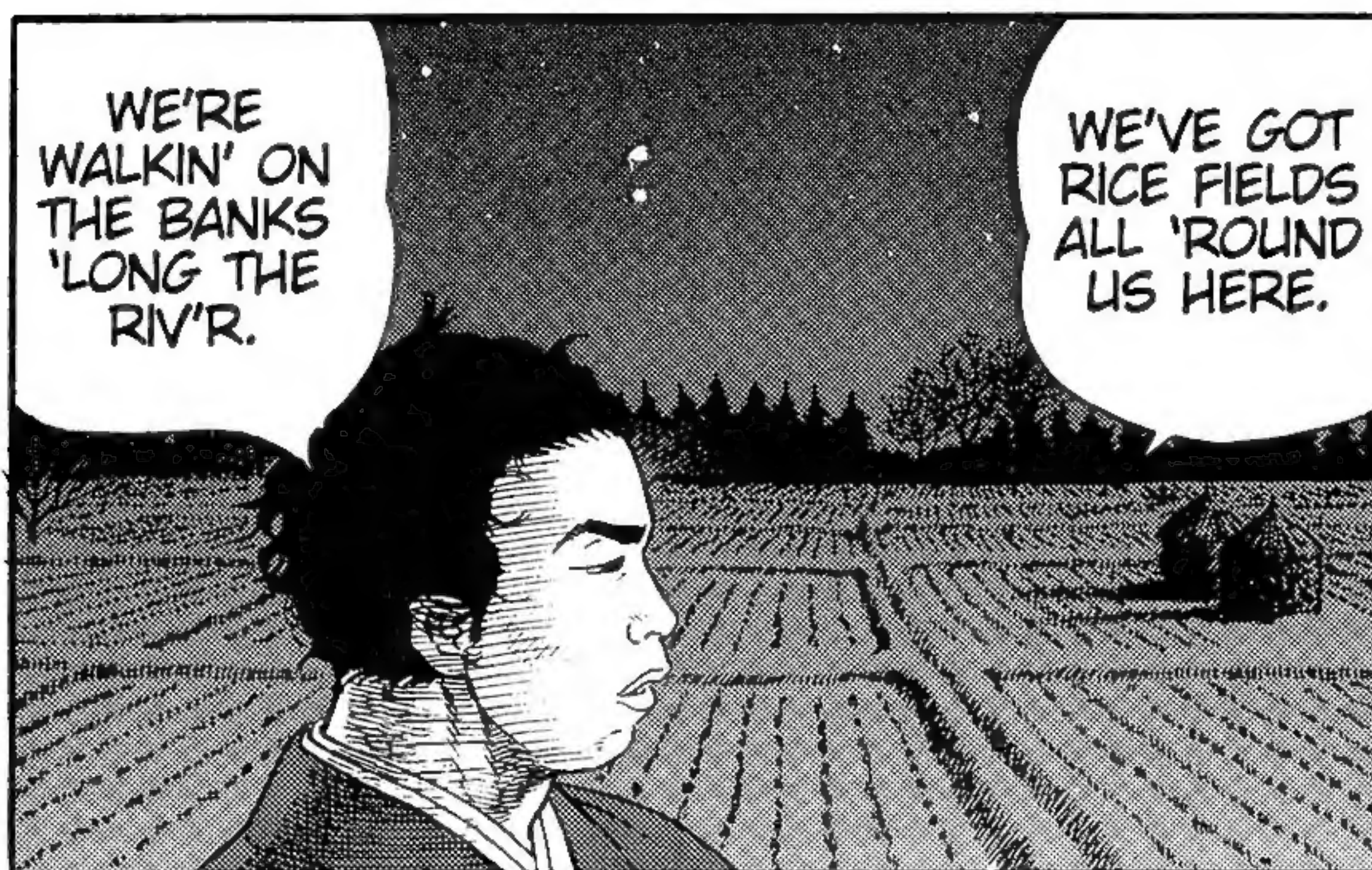




\*SENSO TEMPLE IS AN OLD BUDDHIST TEMPLE IN AKAKUSA, TOKYO, KNOW FOR ITS FIVE STORY PAGODA.







WE'RE  
WALKIN' ON  
THE BANKS  
'LONG THE  
RIV'R.

WE'VE GOT  
RICE FIELDS  
ALL 'ROUND  
US HERE.

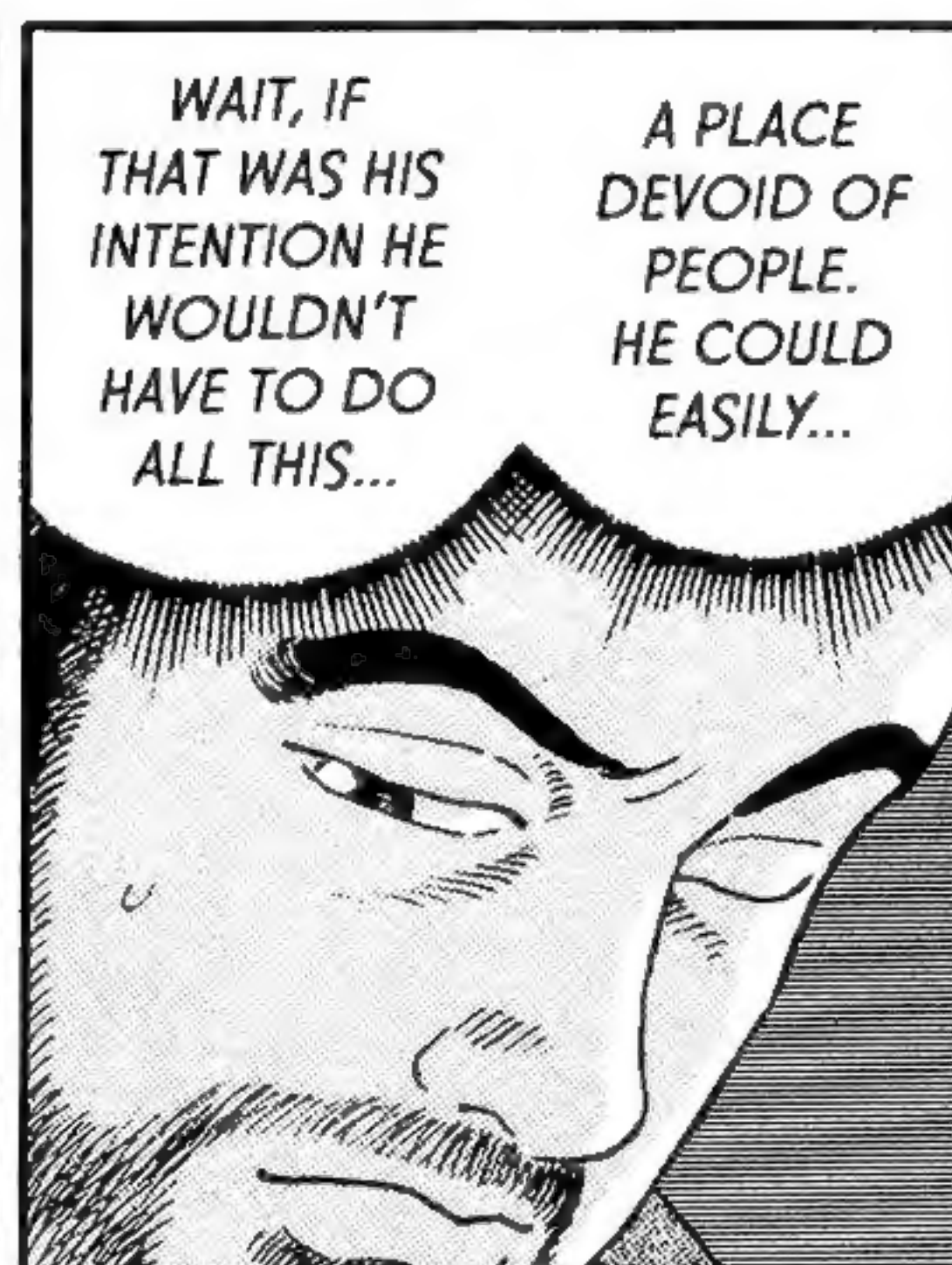


SAKAMOTO-  
DO NO... WHERE  
ARE WE WALKING  
RIGHT NOW?



O-O-KAY!

SENSEI,  
YA BETT'R  
NOT OPEN  
YER EYES!



WAIT, IF  
THAT WAS HIS  
INTENTION HE  
WOULDN'T  
HAVE TO DO  
ALL THIS...

A PLACE  
DEVOID OF  
PEOPLE.  
HE COULD  
EASILY...



MAKE SURE  
YA DON'T OPEN  
YER EYES 'TIL  
I GIVE YA THE  
ALL CLEAR...

NOW WE TURN  
LEFT HERE AND  
GO DOWN THE  
HILL... AND THEN  
WE JUS' NEED TO  
WALK ANOTH'R  
50 KAN\*...

\*ABOUT 90 METERS



